

REPORT DOCUMENTATION PAGE			Form Approved OMB No. 0704-0188	
Public reporting burden for this collection of information is estimated to average 1 hour per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Washington Headquarters Services, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302, and to the Office of Management and Budget, Paperwork Reduction Project (0704-0188), Washington, DC 20503.				
1. AGENCY USE ONLY (Leave blank)		2. REPORT DATE 29 Jun 98		3. REPORT TYPE AND DATES COVERED
4. TITLE AND SUBTITLE THE DETERMINANTS OF JOB SATISFACTION AMONG UNITED STATES AIR FORCE SECURITY POLICE			5. FUNDING NUMBERS	
6. AUTHOR(S) MICHAEL D REINER				
7. PERFORMING ORGANIZATION NAME(S) AND ADDRESS(ES) UNIVERSITY OF NEBRASKA			8. PERFORMING ORGANIZATION REPORT NUMBER 98-028	
9. SPONSORING/MONITORING AGENCY NAME(S) AND ADDRESS(ES) THE DEPARTMENT OF THE AIR FORCE AFIT/CIA, BLDG 125 2950 P STREET WPAFB OH 45433			10. SPONSORING/MONITORING AGENCY REPORT NUMBER	
11. SUPPLEMENTARY NOTES				
12a. DISTRIBUTION AVAILABILITY STATEMENT Unlimited distribution In Accordance With AFI 35-205/AFIT Sup 1			12b. DISTRIBUTION CODE	
13. ABSTRACT (Maximum 200 words)				
19980708 004				
14. SUBJECT TERMS			15. NUMBER OF PAGES 89	
			16. PRICE CODE	
17. SECURITY CLASSIFICATION OF REPORT	18. SECURITY CLASSIFICATION OF THIS PAGE	19. SECURITY CLASSIFICATION OF ABSTRACT	20. LIMITATION OF ABSTRACT	

**THE DETERMINANTS OF JOB SATISFACTION
AMONG UNITED STATES AIR FORCE SECURITY POLICE**

A Thesis

Presented to the

Department of Criminal Justice

and the

Faculty of the Graduate College

University of Nebraska

In Partial Fulfillment

of the Requirements for the Degree

Master of Arts

University of Nebraska at Omaha

by

Michael D. Reiner

March, 1998

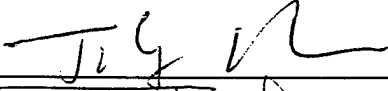

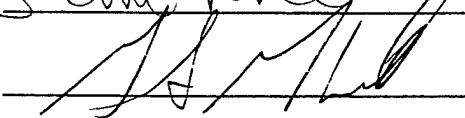
DTIC QUALITY INSPECTED 1


ACCEPTANCE PAGE

THESIS ACCEPTANCE

Acceptance for the faculty of the Graduate College,
University of Nebraska, in partial fulfillment of the
requirements for the degree Master of Arts,
University of Nebraska at Omaha.

Committee

Name	Department/School
	Criminal Justice
	Criminal Justice
	Public Administration

Chairperson 

Date 3/6/98

ABSTRACT

Identifying the factors affecting job satisfaction is an important issue for organizational researchers and managers. A large volume of research has identified two major groups of variables as important determinants of satisfaction. These groups are the demographic characteristics of the employee and the characteristics of the work environment. Building on this theoretical basis, this thesis examined the determinants of job satisfaction among United States Air Force security police.

The security police career field provided a unique source of data. Until 1997, the career field was divided into two primary groups of employees, law enforcement specialists and security specialists. While the demographic characteristics of the two groups were very similar, the daily work environment was markedly different. This provided an opportunity to separate the effects of demographic and work environment variables as determinants of job satisfaction.

The original theoretical model examined only the direct effects of the independent variables. While the overall explanatory power of this model was excellent, many of the key variables had little or no direct effect on job satisfaction. This led to a revision of the theoretical model that allowed for the indirect effects of the independent variables, as mediated by the intermediate variables. Using this revised model, it became apparent that the demographic variables and the assigned Air Force Specialty Code primarily had indirect effects on job satisfaction, while the perceived characteristics of the work environment had direct effects on job satisfaction.

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INTRODUCTION

During the past 60 years, the area of job satisfaction has become an important issue for organizational researchers and managers. The roots of empirical research on employee job satisfaction can be traced back to Robert Hoppock's 1935 book, *Job Satisfaction*, one of the first on the topic (Jayaratne, 1993). Over the next four decades or so, over 3,000 studies on job satisfaction were published in professional journals (Locke, 1976). By 1993, there were 6,247 articles or dissertations on job satisfaction in the PSYCINFO computer database (Jayaratne, 1993). It is obvious that job satisfaction is a topic of considerable interest to both researchers and managers.

The accelerating importance of job satisfaction may be partially attributed to the development of new managerial philosophies. Managers have begun to recognize the organizational benefits which may be gained by improving the satisfaction of the employees. Increased productivity, lower absenteeism, and lower employee turnover are some of the tangible benefits considered as a result of improved job satisfaction (e.g., Schuh, 1967; Hulin, 1968; Reitz and Scott, 1971; Jacobs and Solomon, 1977). Prominent movements such as Total Quality Management also indirectly support increased job satisfaction by emphasizing greater employee involvement and autonomy in the workplace.

Similarly, the increasing strength of the voice of the American worker may also explain some of the growth in interest in job satisfaction. Organized labor has given the individual worker the opportunity to voice concern over the conditions of the work environment, which are closely associated with the level of employee job satisfaction.

Another part of the emphasis on employee satisfaction may stem from the cultural values of American society. According to Muchinsky (1987: 395), "We believe implicitly that everyone has a right to a rewarding, satisfying job." Even among rigidly structured, hierarchical organizations such as police departments and military units, efforts to improve job satisfaction continue because both the employee and the employer have an interest in improving job satisfaction.

While there exists a significant interest in raising the level of satisfaction among employees, there is some debate over the sources of job satisfaction. Two competing theoretical schools dominate the research into the determinants of job satisfaction. The first school of thought theorizes that the characteristics of the individual employee play a predominate role in the satisfaction of the individual. This research tradition focuses on factors such as the gender, ethnicity, age, and educational level of the employee to explain their level of work satisfaction. To improve satisfaction under this model, an employer would need to recruit and hire those people most likely to be satisfied in that particular occupation.

The second theoretical school suggests that the work environment is the prevailing determinant of job satisfaction. Research in this area examines the attributes of the job itself, such as autonomy, variety and significance, to predict the satisfaction of workers in that work environment (e.g., Armstrong, 1971; Sawyer, 1993; Zhao et al., 1998). To improve job satisfaction under this model, an employer would need to redesign the work environment to changes attributes such as significance, autonomy, and task variety (Hackman and Lawler, 1971).

Despite an increasing managerial emphasis on job satisfaction, there has been relatively little empirical research to identify the sources of job satisfaction in police organizations. Griffin et al. (1978: 77) observed that "Job satisfaction, which has long been recognized in private industry as a prerequisite for successful job performance, has been merely a slogan in police organizations." Historically, most researchers in the area of police job satisfaction have focused primarily on the first school of thought. Studies have examined attributes of the individual police officer to predict the level of job satisfaction (e.g., Griffin et al., 1978; Buzawa, 1984; Dantzker, 1992; Buzawa et al., 1994; Dantzker, 1994). Few studies have used the second theoretical model to examine the effects of the work environment on employee satisfaction (e.g., Lurigio and Skogan, 1994; Zhao et al., 1998). This research will attempt to expand this body of knowledge by comparing the utility of the two theoretical models. Specifically, the research will examine the individual and environmental factors affecting job satisfaction among a certain group of police: enlisted members of the United States Air Force security police.

This particular group of police is unique because employees with similar individual attributes have two distinctly different work environments. During peacetime, the United States Air Force security police provide two major categories of services. The personnel assigned to these two categories come from similar educational and demographic backgrounds, complete similar job training programs, are assigned to the same squadron, and have identical pay and living conditions. However, the work environments within these two categories of service are drastically different. These

factors provide an interesting area to research how the attributes of the individual and the work environment affect employee satisfaction.

The first category of service provided by Air Force security police is the law enforcement mission. This includes many traditional police functions, including preventive patrol, order maintenance, crime prevention, and traffic control. Although the level of serious crime on Air Force installations is relatively low, law enforcement specialists remain busy throughout their shift, performing a wide variety of police tasks. Individuals have significant authority and autonomy on the job.

The second service category of Air Force security police is the mission of physical security. This involves controlling entry to restricted areas, responding to alarms, and standing guard around critical Air Force resources (primarily aircraft and missiles). The tasks performed each day are monotonous and routine. An individual may patrol around a large aircraft parking area for an entire shift without observing any activity requiring a security response. The strict security regulations leave no room for individual autonomy or discretion.

For many years, these two security police missions were performed by personnel in separate career tracks. Most individuals assigned to law enforcement or physical security had similar educational and demographic backgrounds. After completing nearly identical training programs, there was very little crossover between the tasks of law enforcement and security specialists. These factors produced an interesting source of information on the determinants of job satisfaction. The characteristics of the individuals in the law enforcement and security specialties are virtually identical, yet the work

environment variables are dramatically different. By examining the differences in the levels of job satisfaction among these two groups, the relative contributions of individual characteristics and the work environment to job satisfaction can be determined.

Currently the Air Force is in the process of combining the law enforcement and physical security career tracks under one job title, "security forces." This change will have a profound impact on the daily tasks of the men and women who have worked as either law enforcement or security specialists in the past. Personnel who previously spent entire work shifts monitoring a fenceline or checking security badges, may now have the opportunity to perform an array of policing tasks. On the other hand, personnel who previously enjoyed the variety of police work, may now spend some work shifts performing monotonous, routinized tasks.

This research will examine the individual and environmental factors which influenced job satisfaction among law enforcement and security personnel immediately prior to the merger of career tracks. The results will provide a benchmark for future studies of the long-term effects of the merger on job satisfaction in the combined security forces career field. In a broader sense, this research will answer the debate over the relative importance of individual characteristics and the attributes of the work environment in police job satisfaction research.

LITERATURE REVIEW

An examination of the concept of job satisfaction should begin with a review of the historical background of the subject. At the beginning of the twentieth century, job satisfaction was not really an issue for researchers or managers. After Frederick Taylor introduced the principles of scientific management, employers began to adopt techniques emphasizing efficiency and productivity. All employees were assumed to be motivated only by financial incentives, while the impact of emotional and psychological factors on the individual worker was all but ignored. (Landy, 1989). However, the classic Hawthorne studies provided an important lesson on the importance of these other factors.

The Hawthorne studies changed the outlook of researchers and managers toward employee attitudes. What began as an experiment on the effect of illumination on productivity, eventually uncovered that there is a close relationship between productivity and employee perceptions and attitudes toward their work. In this series of tests at the Western Electric Company in Cicero, Illinois, work productivity continued to increase, regardless of the changing experimental conditions. Subsequent interviews with the employees showed that the improved productivity was not a result of changes in illumination, but instead stemmed from the employee perceptions of improved interpersonal communication (Roethlisberger and Dickson, 1939). This important finding opened the doors for other researchers to begin to examine the relationships between employee job satisfaction and work performance.

Robert Hoppock's book, *Job Satisfaction*, was the first important publication on this subject. His work was based on interviews of workers in New Hope, Pennsylvania.

He found that 88 percent of the employees in the town were satisfied with their work. Additionally, he found different levels of satisfaction among different occupations. Professional, executive, and managerial employees were the most satisfied group, while unskilled manual laborers were the least satisfied (Hoppock, 1935). This study laid the foundation for future empirical research on job satisfaction.

In the 1950's, an important new theory was advanced concerning job satisfaction. The two-factor theory proposes that one set of factors (motivators) is significantly correlated with job satisfaction, while a different set of factors (hygienes) contributes to job dissatisfaction. Motivators are related to the attributes of the work performed. Examples include variety, challenge, and excitement. A job that successfully fulfills motivator needs will result in satisfaction. Hygienes relate to the physical and psychological work environment. Examples include the acceptability of pay, cleanliness, and supervision. A work environment that fails to adequately satisfy hygiene needs will produce dissatisfaction (Herzberg et al., 1959). While this theory has been widely criticized for lack of empirical support, it has generated further research into the variables that affect job satisfaction (Landy, 1989).

Since the 1960's, many job satisfaction improvement efforts have focused on re-designing the work environment. Organizations seek to improve satisfaction in order to reap benefits in terms of reduced absenteeism, decreased employee turnover, and increased productivity (Muchinsky, 1987). Today, job satisfaction research continues to seek to improve the work experience of employees in numerous occupations.

Despite the importance of job satisfaction to an organization, police have not examined this topic as systematically as other institutions. Dantzker (1994: 77) described the problem: "The importance of job satisfaction to any organization is evident. Yet one group of organizations—police organizations—has largely appeared to ignore job satisfaction and its relationship to the functioning of the organization." The characteristics of the police work environment—dirty, stressful, and sometimes dangerous—make police organizations an interesting field for research into the effect of the work environment on individual satisfaction.

A DEFINITION OF JOB SATISFACTION

After decades of research, it is clear that job satisfaction is a complex, multidimensional concept. A sample of the literature provides an idea of the various definitions of job satisfaction.

"Job satisfaction refers to an overall affective orientation on the part of individuals toward work roles which they are presently occupying" (Kalleberg, 1977: 126).

"Job satisfaction may be defined as a pleasurable or positive emotional state resulting from the appraisal of one's job or job experiences" (Locke, 1976: 1300).

"The term is defined as the favorable viewpoint of the worker toward the work role he presently occupies" (Ivancevich and Donnelly, 1968: 172).

"Therefore, job satisfaction is the extent to which a person derives pleasure from a job" (Muchinsky, 1987: 396).

One common theme in these definitions is that job satisfaction is an individual perception. Each employee assesses his or her work experience in the context of personal background and environmental factors. Because satisfaction is a subjective and personal attribute, it is difficult, but not impossible, to measure.

There are two primary approaches to studying job satisfaction. The first method examines global satisfaction. Survey instruments are designed to assess the overall attitude of an employee toward his or her work. For example, Hoppock's (1935) original study measured global satisfaction using a scale of 100 to 700 points. The Gallup poll is another example of this type of global measure. Surveyors simply ask, "Is your work satisfying?" (Jayaratne, 1993: 115).

Global measures of job satisfaction are useful because they encompass all possible factors that affect satisfaction and provide an overall measure. However, the weakness of global measures is that those factors are not identified. Global measures are not useful for comparisons between employees because two equally satisfied employees may be affected by entirely different factors. This also makes global measures less useful to employers seeking to improve satisfaction because there are no clues as to the attributes which most influence the satisfaction of employees. Finally, global measures are more easily swayed by temporary conditions or emotions (Jayaratne, 1993).

An alternative approach to global measures of job satisfaction is the measurement of various facets of job satisfaction. By examining different aspects of the job separately, the researcher acknowledges the multidimensional character of job satisfaction. Commonly measured facets include satisfaction with pay, promotions, supervision, and the work itself. Overall job satisfaction is a result of some combination of these various facets; however the effect is not simply additive. For different people, the relative contributions of different facets will vary (Jayaratne, 1993).

Global and facet measures of job satisfaction tend to be highly correlated. Jayaratne (1993) reported that, in a survey of literature, facet measures explained 50 to 60 percent of the variance in global satisfaction. Thus it would appear that facet measures can predict a large portion of the overall satisfaction of employees. The selection of a specific global or facet measure for a job satisfaction study would depend on the intended use of the research results. The use of multiple facet measures of satisfaction is more popular because they provide a more detailed picture of specific factors associated with overall satisfaction.

RESEARCH IN JOB SATISFACTION

Having defined the concept of job satisfaction, I will next examine the research efforts of the past that provide the foundation for my research. Job satisfaction research can be divided into three broad categories. First, there have been studies that examined job satisfaction as an independent variable to assess its impact on various dependent variables. Researchers in industrial and organizational psychology have examined the relationships between levels of job satisfaction and work performance, employee stress, absenteeism, and turnover rate.

Early research efforts in this area were not positive. For example, Brayfield and Crockett (1955) found little relationship between job satisfaction and work performance. However, later studies were much more successful. Researchers found that satisfaction was positively correlated with performance in the presence of a positive reward contingent. That is, the reward must be related to the employee's performance (Reitz and

Scott, 1971; Jacobs and Solomon, 1977). Other studies have found that increased job satisfaction lowers the employee turnover rate (Schuh, 1967; Hulin, 1968). This type of research has value in determining the importance of job satisfaction as a means of achieving an organizational goal, such as productivity or efficiency. However, this research does not attempt to explain the sources of job satisfaction.

In the second category of job satisfaction research, researchers use job satisfaction as an intermediate variable. For example, the Michigan Organizational Assessment Questionnaire examines job satisfaction as a psychological state linking the characteristics of the work environment and the individual with employee responses, such as turnover (Cammann et al., 1983). In an example of police-specific research, Greene (1989) used job satisfaction as an intermediate variable in examining the effects on community perceptions of police and police/citizen contact and interaction. He found that different facets of job satisfaction produced different effects on community perceptions and interaction. Officers motivated by serving the public showed greater support for community interaction than those who were motivated by job security. This approach to research values job satisfaction as a transitional state leading to the achievement of other organizational goals.

In the third category of job satisfaction research, researchers have examined job satisfaction as the dependent variable. The goal of this approach is to identify the factors which influence job satisfaction. These factors could include the characteristics of the individual employee, perceptions of the workplace environment, or attributes of the work itself (e.g., Buzawa et al., 1994; Dantzker, 1992; Ewen, 1964; Griffin et al., 1978; Zhao

et al., 1998). This type of research assumes that job satisfaction is a desirable goal and seeks to identify the factors that can produce it.

From this examination of past research, it appears that job satisfaction can be viewed as a continuum from independent variable on one end, to dependent variable on the other. This research employed the third approach—job satisfaction as the dependent variable. The literature review that follows examines in greater detail the past research into the factors that influence the satisfaction of employees.

FACTORS AFFECTING JOB SATISFACTION

In attempting to identify the factors that best predict employee job satisfaction, researchers have focused primarily on two groups of independent variables. The first group includes those factors that are characteristics of the individual employee, such as race, age, or gender. The second group includes attributes of the work performed by the employee, such as autonomy or variety (Steers, 1981). This literature review will examine past research in these two areas.

Demographic Factors: Characteristics of the Employee

Considerable research attention has been devoted to the characteristics of the individual employee. Demographic variables often examined include race, educational level, age, years of service, rank, and gender. These variables are thought to influence satisfaction based on differences in the socialization of the employees.

"The frame of reference the worker brings with him to the job is, then, a determinant of the satisfaction he is likely to derive from it. Hence, should a subculture in the United States provide its members with a different frame of reference from the majority viewpoint, it is anticipated that differences will be reflected in workers' perceptions of job satisfaction" (O'Reilly and Roberts, 1973: 295).

Race. The issue of racial differences in job satisfaction has been studied in many occupations. A primary emphasis has been on the difference in job satisfaction between black and white employees. Most studies found white employees were more satisfied than blacks (Near et al., 1978; Quinn and Staines, 1979). In a review of seven national surveys of overall job satisfaction, blacks were significantly less satisfied than whites (Weaver, 1980). In one study, O'Reilly and Roberts (1973) found that white hospital workers were significantly more satisfied than non-white workers with their work and with their supervision. In addition, Slocum and Strawser (1972) observed that blacks accountants were less satisfied than whites, particularly in the area of self-actualization and compensation. The differences were ascribed to the social isolation of being in an extreme minority and to the lack of job security due to discriminatory employment practices.

Although many studies have found satisfaction to be lower among minority groups, there are other studies that have found the opposite to be true. For example, a study in the United States Navy found black sailors were significantly more satisfied with pay and promotion opportunities and had higher job involvement and internal work motivation than white sailors (Jones et al., 1977). Another study of military personnel found black soldiers were significantly more satisfied with their work, supervision, pay,

and promotions than white soldiers. The only facet of the job that showed no difference between white and black soldiers was satisfaction with coworkers (Shiflett, 1988).

Finally, there are studies that found little or no difference in job satisfaction based on race. A study by Weaver (1977) found statistically significant differences in job satisfaction between blacks and whites, however the proportion of variance explained by race was very small. A study in a Southern factory found blacks significantly less satisfied than whites, with race explaining over 50 percent of the variance in satisfaction (Moch, 1980). However, when Konar (1981) re-analyzed the data, most of the explanatory power of race was accounted for by differences in structural and cultural variables within the factory. Two other studies of male blue-collar employees found black workers to be only slightly more satisfied than white employees. The race of the employee only explained about 2.5 percent of the variance in satisfaction in each study (Gavin and Ewen, 1974; Katzell et al., 1974). In a study of over 1,100 public sector employees, Hopkins (1983) found no relationship between race and job satisfaction. A recent study of Canadian and American correctional officers also found no significant relationship between race and satisfaction (Walters, 1996).

Several researchers have specifically studied the relationship of race to satisfaction among police officers. In her review of past research, Buzawa (1984) reported that black police officers were less satisfied than white officers. However, in her study, black officers were more satisfied than their white counterparts. The magnitude of the correlation was small among members of the Oakland Police Department, but much higher among officers in Detroit. Ten years later, a follow-up survey in Detroit found that

black officers continued to be more satisfied with their work than white officers. For example, 45 percent of white officers reported "low" job satisfaction, compared with only 17 percent of black officers. "High" job satisfaction was reported by 13 percent of black officers and only 2 percent of white officers (Buzawa et al., 1994).

Dantzker (1994) found similar results in a study of one mid-size Southern police department. Race was the strongest predictor of job satisfaction. Black officers were significantly more satisfied than white officers. Hispanic officers reported the highest satisfaction of any group; however the small sample size ($N=3$) reduced the value of that portion of the research.

In summary, it appears that race alone is not a direct determinant of job satisfaction. The differences in satisfaction among employees seem to depend on race-related differences in the work environment (e.g., affirmative action programs or racial discrimination) rather than on the individual attribute of race. Even when significant differences are found based on race, the proportion of variance explained by race is negligible. As an independent variable, race has very little explanatory power.

Educational Level. The relationship between education and job satisfaction has also been examined in numerous cross-occupational studies. A broad review of national surveys of overall job satisfaction found that prior to 1964, education was either negatively related or unrelated to job satisfaction. Since then, a positive relationship has emerged. Employees with college degrees were significantly more satisfied than those with only a high school diploma (Weaver, 1980). However, a multiple regression analysis of three national surveys found education to only be significantly related to

satisfaction for white employees. This relationship was very weak and only explained 0.1 percent of the variance in satisfaction (Weaver, 1978a). Another cross-occupational study also found the link between education and satisfaction to be very weak (Near et al., 1978). A recent study of Canadian and American correctional officers found the level of education to be negatively related to satisfaction, but only among Americans. Among Canadian officers, there was no significant relationship (Walters, 1996).

Raising educational requirements for police officers is not a new idea. Seventy years ago, August Vollmer wrote that police should be well educated. (Griffin et al., 1978) The call for higher education for officers was repeated in the President's Commission on Law Enforcement and Administration of Justice *Task Force Report: The Police* (1967). The National Advisory Commission on Criminal Justice Standards and Goals (1973) recommended bachelor's degrees for all police officers by 1982. The effect of higher education on the satisfaction of police officers has been examined in several studies.

Buzawa (1984) found that education was inversely related to job satisfaction. That is, police officers with more education were less satisfied than those with less education. This relationship was strong in a survey of the Oakland Police Department, but much weaker in the Detroit Police Department. A decade later, a follow-up study in Detroit found that the level of education was still not an important determinant of job satisfaction among police in that city (Buzawa et al., 1994).

Using a survey of five police departments in Illinois, Texas and California, Dantzker (1992) discovered a positive relationship between education and satisfaction,

but only among police officers with less than five years experience. More experienced officers showed a negative relationship between education and satisfaction. In a survey of one mid-size Southern police department, Dantzker (1994) found officers with associate's degrees and bachelor's degrees were only slightly more satisfied than those with only a high school education. However, these differences were not statistically significant.

Worden (1990) found that the level of education does not have a significant effect on the attitudes of police officers. Specifically, morale was not correlated with the level of education. This agreed with an earlier report that found the level of education does not seem to affect the attitudes or values of police officers (Weiner, 1974). Both of these police-specific reports concurred with the general findings of Feldman and Newcomb (1969). They published a summary of hundreds of surveys of college students that showed a college education did little to change the attitudes of students toward job attributes.

As an independent variable, the level of education does not appear to be a strong predictor of job satisfaction among police officers. The effects of education seem to vary depending on the environment of each individual police department.

Age. Another demographic variable often examined by researchers is age. One early study reported a U-shaped relationship between age and job satisfaction. Satisfaction was high among workers under the age of 20 years. Workers in the 20 to 29 year age group had the lowest satisfaction. After the age of 30 years, satisfaction increased for each successive age group (Herzberg et al., 1957). A literature review by

Carroll (1969) found 17 of 23 studies conducted prior to 1960 reported this U-shaped relationship. However, many studies since 1960 have instead found a positive linear relationship between age and job satisfaction (e.g., Altimus and Tersine, 1973; Gibson and Klein, 1970; Hunt and Saul, 1975; Near et al., 1978; Quinn and Staines, 1979; Rousseau, 1978; Saleh and Otis, 1964; Weaver, 1980). A review of literature since the Herzberg report found only one bivariate study (consisting of two samples) in which a U-shaped relationship was reported. In the same time period, there were eight bivariate studies (consisting of 22 samples) and seven multivariate studies that reported a positive linear relationship. These findings were consistent across many groups, including public and private organizations, white-collar and blue-collar occupations, and male and female employees (Rhodes, 1983).

A multiple regression analysis of three national surveys found age to be the strongest demographic determinant of job satisfaction among black and white workers. However, this variable predicted only 4.2 percent of the variance in satisfaction among whites and 2.3 percent among blacks (Weaver, 1978a). Another multivariate study found a statistically significant positive relationship between age and satisfaction. However, age only explained 1.5 percent of the variance among men and 3.1 percent among women (Glenn et al., 1977). A study in Australia found that the correlation between job satisfaction and age was negligible when the researcher controlled for income and education (O'Brien and Dowling, 1981).

The research on the effect of age on job satisfaction among police officers has produced mixed results. In the Detroit Police Department older officers were the least

satisfied. Among officers over the age of 34, 42 percent reported "low" job satisfaction. The rates among officers under the age of 25 (26 percent) and officers in the 25-34 age bracket (18 percent) were significantly lower (Buzawa et al., 1994).

In a mid-size Southern police department, Dantzker (1994) reported exactly the opposite trend. Officers in the 26-35 age group reported the lowest job satisfaction (A mean score of 3.31 on a scale of 1 to 5). Officers over the age of 35 reported a higher level of satisfaction (3.46). The youngest officers rated their level of satisfaction as the highest (3.74). The age of the officer was one of the two strongest predictors of job satisfaction in this study.

It would appear from this literature review that age is the strongest predictor of job satisfaction among the demographic variables. However, the linear positive relationship often found in cross-occupational research is not clearly evidenced in police organizations. Perhaps other organizational factors that covary with age are affecting the results.

Years of Service. In general, the effects of tenure on job satisfaction would be expected to be highly correlated with the effects of age. Hunt and Saul (1975) found a positive linear relationship between tenure and satisfaction, similar to the relationship between age and satisfaction. However, at least one study found this to be untrue. Gibson and Klein (1970) found a linear negative relationship between tenure and satisfaction, but a positive relationship between age and satisfaction. They proposed these two relationships combined to produce the U-shaped relationship commonly attributed to age alone. A recent survey of Canadian and American correctional officers

found a significant negative relationship between tenure and satisfaction. This was the only demographic variable in the study that was found to be statistically significant for both Canadian and American correctional officers (Walters, 1996).

In police research, the results have been varied. In the Detroit and Oakland Police Departments, Buzawa (1984) found a negative correlation between tenure and satisfaction. In both departments, the longer the officers served, the more their levels of satisfaction decreased. Ten years later, a follow-up study in Detroit found a "strong inverse linear relationship" between tenure and satisfaction (Buzawa et al., 1994: 71).

Burke (1989) found results similar to the U-shaped curve sometimes reported in studies of age and satisfaction. The level of satisfaction among officers with little experience was high, then dropped gradually until the 16 years of service. After that point, the level of satisfaction rose again gradually.

Because of the lack of lateral mobility in police careers, age and tenure are more closely correlated in the police and the military than in other occupations. For this reason, it may be difficult to separate the effects of age and tenure on the level of job satisfaction. There is little evidence of a clear relationship between tenure and satisfaction that could be generalized to all police organizations.

Rank. While many occupations do not employ the formal rank structure common to police and military organizations, there are variables that can be interpreted in a similar manner. Level of supervisory position and income are two "civilian" organizational variables that directly correspond to rank. A multiple regression analysis of three national surveys found that level of supervisory position and income were both significantly

related to job satisfaction. However, these variables each explained less than 1 percent of the variance in satisfaction (Weaver, 1978a). Walters (1996) found no relationship between rank and satisfaction among Canadian and American correctional officers.

In a mid-size Southern police department, Dantzker (1994) found no statistically significant differences in job satisfaction based on rank. Sergeants did have significantly lower scores on some individual indices, but overall satisfaction levels were similar for all ranks. Worden (1990) did find a significant positive relationship between rank and officer morale. The higher ranking officers reported higher levels of morale.

Because of the lack of lateral mobility in police organizations, the effects of rank on job satisfaction will be highly correlated with age and years of service. However, the combined effects of these three demographic variables have not been consistently demonstrated across the field of policing.

Gender. The relationship of gender to job satisfaction has also been extensively researched in various occupations. However, the results have been mixed. Hulin and Smith (1964: 88) concluded, "The findings of the investigations on sex differences in job satisfaction, however, are somewhat contradictory and permit no neat cogent statement of the relationship between sex and job satisfaction." Many past cross-occupational studies have discovered no significant differences in job satisfaction between male and female employees (Near et al., 1978; Weaver, 1977; Weaver, 1978b; Weaver, 1980). Any differences discovered seemed to be situational and were linked to other environmental and societal factors. The results could not be generalized to other occupations or organizations (Carroll, 1969). One study found the satisfaction of men was linked to the

level of supervision, autonomy, and position, while the satisfaction of women was linked to the level of complexity, cleanliness, and income (Miller, 1980). Another study found that all statistically significant differences between men and women disappeared when the data was adjusted based on nine covariates (Sauser and York, 1978).

One notable trend discovered in past studies is that women were less satisfied than men when they were “markedly in the minority, were treated differentially, or were underutilized” (Buzawa, 1984: 62). The underutilization of women was a strong dissatisfier according to Andrisani and Shapiro (1978). Weaver (1978b: 271) noted, “In a given situation, however, if the sexes are unequally affected by the determinants of job satisfaction, such as differential wages or prestige, or if other influences, such as societal norms, differentially intervene between job satisfaction and these determinants, then sex differences in job satisfaction can be expected to result.” Since women are a small minority in many police departments, gender could become a determinant of police officer job satisfaction.

Research among police organizations has produced mixed results. In the Oakland Police Department, women were less satisfied than men. However, in the Detroit Police Department, the opposite was true. This may have been a factor of the relative number of women in the two departments. At the time of the research, only 2 percent of the police officers in Oakland were female. In Detroit, women comprised 11 percent of the police department (Buzawa, 1984). Ten years later, women in the Detroit Police Department still reported higher levels of satisfaction than men. At that time, Detroit had the highest percentage of women of any police force in the country (Buzawa et al., 1994). From

these results, it seems that the importance of gender as a predictor of job satisfaction is dependent on the relative number of female officers in the organization.

Like race, the gender of an employee alone does not appear to be a direct determinant of job satisfaction. However, gender-related differences in the work environment (e.g., underutilization of women, sexual discrimination, or differential pay) can affect levels of satisfaction.

Summary of Demographic Variables. From these various studies, it can be seen that demographic variables have limited utility as predictors of job satisfaction. Weaver (1977: 44) concludes, "It is surprising that variables which have been the focus of so much interest with respect to job satisfaction have so little explanatory power." Additionally, the correlations can not be generally applied across different occupations. In some cases the relationships vary within the same occupation in different localities. It would appear that any correlations discovered between job satisfaction and demographic variables can only be applied to similar organizations. Another important lesson from the body of literature is the importance of multivariate methods of analysis. Statistically significant differences found with bivariate analysis often disappear when a multivariate regression is used (Weaver, 1977).

Job Attribute Factors: Characteristics of the Work Environment

The characteristics of the immediate job environment play a major role in the several prominent theories of job satisfaction. Among police researchers, the foremost of these theories is the Herzberg two-factor theory. This theory has been presented in nearly

all police administration textbooks. This theoretical model places great importance on the nature of the work environment as the primary determinant of job satisfaction (Jayaratne, 1993). The two-factor model builds on the foundation of Maslow's theory of the hierarchy of needs.

Maslow (1943) proposed that individuals seek to satisfy their needs in a particular sequence, a hierarchy consisting of five levels. In general, the lower-order needs must be fulfilled before higher-order needs can be satisfied. (Although later research by Maslow (1954) found that sometimes the desire to satisfy higher-order needs may precede the fulfillment of lower-order needs.)

At the lowest level, people have physiological needs for food, water, clothing and shelter. The second level of needs involves physical safety and security. According to Hackman and Lawler (1971: 262), "Most lower level needs (e.g., physical well-being, security) can be (and often are) reasonably well satisfied for individuals in contemporary society on a continuing basis and, therefore, will not serve as motivational incentives except under unusual circumstances."

The third level in the needs hierarchy consists of social needs such as a sense of belonging and love. The fourth level of needs involves the self-esteem of the individual. Feelings of adequacy and usefulness, as well as recognition from others, lead to an increased sense of personal value. The final level of Maslow's hierarchy is described as self-actualization. This is the sense of being all that one can be or fulfilling one's potential. These higher-order needs (particularly self-esteem and self-actualization) are less likely to be routinely satisfied in the workplace (Hackman and Lawler, 1971).

Many of the attributes of the work environment that are thought to be related to job satisfaction are those which meet the higher-order needs of self-esteem and self-actualization. Assuming the lower-order needs are met, a person will be most satisfied with the job that best fulfills the need for self-esteem and self-actualization. For example, work that requires a great variety of skills would theoretically provide a greater challenge to employees, producing greater satisfaction by meeting the need for self-actualization. Herzberg (1959; 1966) theorized that a job should provide opportunity for achievement, recognition, responsibility, advancement, and growth in competence, in order to satisfy the higher-order needs of employees. By identifying these relevant attributes of the work environment, employers can target specific areas for improvement. This process is known as job redesign, job enlargement, or job enrichment (Gannon, 1979).

Building upon the theoretical groundwork of Maslow and Herzberg, Turner and Lawrence (1965) identified six key attributes of a job that would contribute to the satisfaction of higher-order needs. These attributes were variety, autonomy, required interaction, optional interaction, knowledge and skill required, and responsibility. Later Hackman and Lawler (1971) proposed the dimensions of variety, autonomy, task identity, feedback, dealing with others, and friendship opportunities. This early research is the basis for today's most commonly used measures of job content, the Job Diagnostic Survey (Hackman and Oldham, 1975), the Job Characteristic Inventory (Sims et al., 1976), and the Michigan Organizational Assessment Questionnaire (Cammann et al., 1983).

In the development of the Job Diagnostic Survey, Hackman and Oldham (1975) distinguished five core dimensions of the work environment that are critical to the fulfillment of higher-order needs. These dimensions are skill variety, task identity, task significance, autonomy, and feedback from the job itself. They also identified two supplementary dimensions: feedback from agents and dealing with others. The five core dimensions are theoretically linked to three critical psychological states: experienced meaningfulness of the work, experienced responsibility for outcomes of the work, and knowledge of the actual results of the work activities. In turn, the three psychological states are theoretically linked to key personal and work outcomes. Positive changes in the psychological states should produce greater internal work motivation, higher quality performance, higher satisfaction with the work, and lower absenteeism and employee turnover.

The first three core dimensions (skill variety, task identity, and task significance) are theoretically linked to the psychological state of experienced meaningfulness of work. When an employee perceives the work as meaningful and important, positive feelings are generated that improve the workers' self-esteem (Hackman and Lawler, 1971). Hackman and Oldham (1975: 161) define these dimensions as:

Skill Variety. "The degree to which a job requires a variety of different activities in carrying out the work, which involve the use of a number of different skills and talents of the employee."

Task Identity. "The degree to which the job requires completion of a 'whole' and identifiable piece of work—that is, doing a job from beginning to end with a visible outcome."

Task Significance. “The degree to which the job has a substantial impact on the lives or work of other people—whether in the immediate organization or in the external environment.”

The fourth core dimension (autonomy) is linked to the psychological state of experienced responsibility for outcomes of the work. In a job that allows greater autonomy, the employee develops a sense of ownership in the product or service provided. This leads to feelings of personal success and increased self-esteem (Hackman and Lawler, 1971). Hackman and Oldham (1975: 162) define this dimension as:

Autonomy. “The degree to which the job provides substantial freedom, independence, and discretion to the employee in scheduling the work and in determining the procedures to be used in carrying them out.”

The fifth core dimension (feedback from the job itself) is linked to the psychological state of knowledge of the actual results of the work activities. This dimension addresses the need for self-esteem and self-actualization by showing the employee progress toward the successful completion of the task. Hackman and Oldham (1975: 162) define this dimension as:

Feedback from the Job Itself. “The degree to which carrying out the work activities required by the job results in the employee obtaining direct and clear information about the effectiveness of his or her performance.”

The two supplemental dimensions are not directly linked to any of the three psychological states in the theoretical model. Instead they provide additional information that proves useful in understanding employee perceptions and attitudes in the workplace. Hackman and Oldham (1975: 162) define these dimensions as:

Feedback from Agents. “The degree to which the employee receives clear information about his or her performance from supervisors or from co-workers.”

Dealing with Others. “The degree to which the job requires the employee to work closely with other people in carrying out the work activities.”

While the dimensions identified by Hackman and Oldham are some of the most common of those employed by organizational researchers, the list is not all inclusive. For example, the development of the Michigan Organizational Assessment Questionnaire expanded upon the work of Hackman and Oldham, identifying nine job characteristics. The core dimension of task identity was divided into two separate variables: “task completeness (the extent to which the job allows the completion of an entire unit of product or service) and task impact (the extent to which task performance makes a significant difference in the final product or service).” Three additional variables were added to measure the pace of the work, the level of training required, and the adequacy of training received. These additional variables address the same three psychological states proposed by Hackman and Oldham (Cammann et al., 1983: 91-92).

The work environment theoretical model has been widely applied to occupational research. For example, Armstrong (1971) examined the differences between engineers and assemblers in a New York electronics company using measures of the work environment. This study examined five dimensions of the job content: recognition, responsibility, achievement, advancement, and the work itself. Engineers rated their jobs significantly higher in each of the five work content dimensions and also rated their overall job satisfaction higher than the assemblers.

Although measures of the attributes of the work environment have been applied to numerous occupations, they have only rarely been used to assess police organizations.

One published study measured several of the work dimensions among officers of the Chicago Police Department. The study found that police rated their job highly on the dimension “working with others.” The officers rated the dimensions of “task identity” and “feedback from agents” much lower. Only about one-third of the respondents agreed or strongly agreed that their supervisors provided performance feedback or that they could complete a “whole” task. On the dimensions of autonomy, skill variety, and job feedback, officers rated their jobs slightly above neutral (Lurigio and Skogan, 1994).

Recent surveys in four metropolitan police departments found officers rated the task significance, autonomy, and skill variety of their jobs very highly (over 5 on a scale of 1 to 7). Feedback from the job itself and task identity were slightly lower, but still above the neutral score. Additionally, four of the five dimensions measured were significantly related to job satisfaction. Skill variety had the greatest impact, followed by task identity, autonomy, and task significance. Feedback from the job itself was not a significant factor in satisfaction with work (Zhao, 1997; Zhao et al., 1998).

Summary of Factors Affecting Job Satisfaction

Although the bulk of job satisfaction literature in cross-occupational and police-specific research has focused on the characteristics of the individual, the characteristics of the work environment seem to be stronger predictors of job satisfaction. For example, in a recent study, the demographic variables of ethnicity, gender, education, tenure, and rank only explained 6 percent of the variance in satisfaction with the job, 2 percent of the satisfaction with supervision, and 2 percent of the satisfaction with co-workers. Adding

work environment variables increased these values to 49 percent, 30 percent, and 17 percent, respectively (Zhao et al., 1998). Thus it would appear that the work environment variables would be of greater interest to researchers of job satisfaction among police officers.

Another important point is that all the research reviewed used either the demographics model alone, or compared the demographics model to the work environment model. In studies using demographics alone, the results were inconsistent and inconclusive. In studies comparing the two theoretical models, the work environment model appeared to have greater explanatory power. However, the effects of the work environment alone were never really tested. This research will go one step beyond by testing the effects of the work environment while controlling the demographic variables. This is possible because of the unique population that will be sampled.

This research effort will examine two groups of United States Air Force security police with very similar individual characteristics and extremely different work environments. By controlling for the demographic variables, the true effects of the work environment will be revealed. If the work environment model is correct, those personnel in jobs that satisfy the motivator needs (law enforcement specialists) should have significantly higher levels of job satisfaction than those in jobs that do not fulfill motivator needs (security specialists). This research will provide important information on the relative importance of specific workplace environmental attributes on employee job satisfaction.

RESEARCH DESIGN

To assess the effects of the demographic and work environment variables on job satisfaction, this research used a multivariate regression analysis. Based on the literature review, relevant dependent and independent variables were selected. Scales to measure these variables were also selected from the literature. Data was collected using a written survey of Air Force security police personnel. The data was analyzed using the Statistical Package for Social Sciences software. Informal interviews with security police personnel supplemented the quantitative data.

DEPENDENT VARIABLE

The dependent variable in this research was job satisfaction. Today most measurements of job satisfaction rely to a great extent on the use of Likert scales. For example, Brayfield and Rothe (1951) used a 5-point Likert scale (Strongly Agree, Agree, No Opinion, Disagree, Strongly Disagree) to measure the attitude of workers in response to 18 statements about work. The resulting index was one of the early measurements of global job satisfaction.

Currently, one of the most commonly used measurements of facet job satisfaction is the Job Descriptive Index developed by Smith, Kendall and Hulin (Landy, 1989). This instrument presents an employee with a series of words or phrases that could describe a job. Some of the descriptions are attributes of a satisfying job (e.g., fascinating, creative, or respected), while other descriptions are attributes of an unsatisfying job (e.g., endless, frustrating, or boring). For each item, the respondent indicates whether the word or

phrase describes his or her job. Positive answers to “satisfying” attributes and negative answers to “unsatisfying” attributes increase the overall index score (Smith, 1974).

The Job Descriptive Index has been used frequently to assess worker satisfaction. A search of the PSYCHLIT computerized database found 277 journal articles that referred to the Job Descriptive Index between 1974 and 1997. The validity and reliability of this instrument have been tested among different occupational, racial, and gender groups (Hulin, 1968; Hulin, 1969; Smith et al., 1974). Among police researchers, the Job Descriptive Index has recently been used to assess the satisfaction of four metropolitan police departments (Zhao, 1997; Zhao et al., 1998).

Because the Job Descriptive Index has been extensively used and proven to be a reliable measure of job satisfaction, it will be used as the primary dependent variable in this research. Specifically, three facets of the Job Descriptive Index will be employed: satisfaction with work, satisfaction with supervision, and satisfaction with co-workers.

INDEPENDENT VARIABLES

Based on past research described in the literature review, the relevant independent variables were divided into two primary groups. The first group included demographic variables, such as race, gender, age, educational level, tenure, and rank. The second group included work environment variables, such as autonomy, variety, and significance.

Demographic Variables

The variable “race” was operationalized as “ethnicity” using the standard Department of Defense categories: American Indian, Black (non-Hispanic), White (non-

Hispanic), Hispanic, Asian/Asian-American/Pacific Islander, and Other. Age was measured in years and gender was classified as male or female. Rank was measured from E-1 (Airman Basic) to E-7 (Master Sergeant). Educational level was categorized into five levels, ranging from high school graduate (or Graduate Equivalency Degree) to completed graduate degree. Tenure was measured by the number of months served in the Air Force.

Work Environment Variables

The first important work environment variable was the Air Force Specialty Code (AFSC) to which the respondent was assigned. Law enforcement and security specialists perform significantly different tasks in their daily assignments. These differences in the work environment could have a significant effect on job satisfaction for these two groups within the security police career field.

The other important work environment variables were the five core dimensions of the Job Diagnostic Survey: skill variety, task identity, task significance, autonomy, and feedback from the job itself. Each of these dimensions was measured by three items using a 7-point Likert scale. Since the development of this instrument, the Job Diagnostic Survey has become one of the most popular measures of job attributes employed by psychology researchers. (Idaszak et al., 1988) It has been thoroughly tested and applied to many different work environments, including public sector employees (Lee and Klein, 1982) and military personnel (Harvey et al., 1985). There has been some debate as to the appropriate number of dimensions to measure, and a suggested revision to the survey was proposed (Idaszak and Drasgow, 1987); however the original instrument is still

considered to be reliable and valid and continues to be recommended for use (Kulik et al., 1988). Research has also shown that the principal dimensions of the Job Diagnostic Survey appear most clearly when the items are placed near the beginning of a written survey, rather than near the end (Idaszak et al., 1988).

DATA COLLECTION

To collect data about the factors that affect job satisfaction among Air Force security police, a written survey was conducted in May of 1997 at Offutt Air Force Base, near Omaha, Nebraska. The responses to the surveys were coded and analyzed using the Statistical Package for Social Sciences software. Informal interviews with security police personnel supplemented the quantitative data.

Sample

The 55th Security Police Squadron at Offutt Air Force Base, Nebraska, was chosen to represent the Air Force security police career field in this research. This squadron was a reasonable choice for several reasons. First, the squadron has a large and varied mission. Over 400 security police personnel work in the unit. This large pool of personnel increased the chances of obtaining a sufficient sample of both law enforcement and security specialists. Second, the geographic proximity of the base minimized research costs and allowed for personal administration of the survey instrument.

The survey was only administered to personnel working in "front-line" positions as law enforcement or security specialists. Staff and administrative personnel were excluded from the research because their work is significantly different. After eliminating

staff personnel, as well as a significant number of personnel deployed to other locations, a pool of about 180 personnel was available to complete the survey instrument. Those surveyed were all enlisted personnel in the ranks of master sergeant and below.

Survey Instrument

Data was collected using an 8-page survey instrument. The complete survey instrument is included in Appendix A. The first page of the instrument obtained demographic information, including age, gender, rank, ethnicity, educational level, time in service, and Air Force Specialty Code (AFSC). Sections 1 and 2 of the survey gathered information on each dimension of the Job Diagnostic Survey. Section 3 measured three facets of the Job Descriptive Index (satisfaction with work, satisfaction with supervision, and satisfaction with co-workers). Sections 4, 5 and 6 were short indices gauging satisfaction with the immediate work group, satisfaction with supervision, and satisfaction with the overall organization. Section 7 assessed commitment to the job and Section 8 used the scale of terminal values developed by Milton Rokeach (1968). The information collected in Sections 4 through 8 was not used in this analysis.

The survey instrument was reviewed and approved by the Institutional Review Board of the University of Nebraska at Omaha (IRB Number 109-97-EX), as well as the Air Force Personnel Center Survey Branch (Survey Control Number 97-19). In addition, permission to administer the survey was obtained from the commander of the 55th Security Police Squadron.

Survey Administration

The survey was personally distributed by the researcher during the roll call formation at the beginning of each shift. The purpose of the survey was explained and questions were answered. One copy of the survey was given to each person in the formation; however completion of the survey was completely voluntary. In all, 184 surveys were distributed during 8 shifts. The surveys were collected as personnel returned to the armory to return weapons at the end of each shift. A total of 135 surveys were completed; a response rate of 73.4 percent.

The high response rate can be attributed to at least two factors. First, the pace of the Air Force security police work environment consists of much "dead time." Many respondents echoed the words of a veteran law enforcement sergeant: "We enjoy (the job) when it's busy, but boredom is sometimes a problem." For at least one shift, respondents could ease the boredom by completing the survey. A second factor was that many respondents were eager for a chance to voice their concerns about the security police career field. Many wrote additional comments in the margins of the survey, and some even attached additional paper with in-depth comments on the work environment.

Informal Interviews

To supplement the quantitative data collected with the survey instrument, the researcher conducted ten hours of informal interviews with law enforcement and security personnel. A total of 35 personnel were interviewed during two 12-hour shifts. This represented about 50 percent of the personnel working during these shifts. The personnel

were selected for interview by visiting a random sample of the gates, guard shacks, and patrol vehicles, and interviewing anyone at the location.

The interviews were unstructured and open-ended. They were conducted in the work environment. By going to the patrol cars, guard shacks, and gate houses, the researcher placed the interviewees in a familiar, relaxed setting. Discussions were either one-on-one or in small groups. Supervisors were rarely present to prevent any fear of retribution. Questions explored the factors affecting the job satisfaction of the personnel.

DATA ANALYSIS

The responses to each of the 135 completed surveys were entered into a database for analysis with the Statistical Package for Social Sciences software. Descriptive statistics were produced for all key variables, and correlations between the variables were examined. Law enforcement and security personnel were compared using a t-test. Finally, a multivariate regression was used to assess the relative importance of each variable in contributing to job satisfaction.

Descriptive Statistics and Group Comparisons

The descriptive statistics for the demographic variables are detailed in Table 1. The sample was predominantly white (75.6 percent of the sample) and male (95.6 percent of the sample). The sample was young, with half the respondents under the age of 25 and an average age of 27 years. Nearly half had served in the Air Force for less than 4 years, with an average of 7.25 years served. About 80 percent of those surveyed held the ranks of E-3 (Airman First Class), E-4 (Senior Airman), or E-5 (Staff Sergeant). Over half the

respondents had completed some college courses, but only 22.2 percent had earned an associate's degree or higher.

The descriptive statistics seemed to indicate that law enforcement and security specialists were very similar with respect to the demographic variables. To test this observation, a t-test was conducted. The results of the t-test for the demographic variables are displayed in Table 2. There was no statistically significant difference between law enforcement and security specialists in terms of gender, age or rank. However, the average law enforcement specialist was more likely to be white, have more time in service, and have more education than the average security specialist.

The descriptive statistics for the work environment variables are detailed in Table 3. The sample of 135 personnel included 91 security specialists and 44 law enforcement specialists. Mean scores were also computed for each of the five core dimensions of the Job Diagnostic Survey. The highest-rated dimension was task significance. Each of the other four dimensions was rated below the middle of the 7-point Likert scale. The lowest-rated dimension was skill variety.

To provide a reference point, the scores of the Job Diagnostic Survey for the Air Force security police were compared with the scores of two civilian police departments. The first department was located in a medium-sized city in the Pacific Northwest. The second department was a medium-sized city in the Midwest. The results of this comparison are also shown in Table 3. Overall, the scores for each of the five core dimensions of the Job Diagnostic Survey were substantially lower than those of the two civilian police departments. However, when law enforcement and security specialists

were examined separately, Air Force law enforcement specialists rated their jobs higher than their civilian counterparts in the dimensions of task identity and task significance.

The results of the t-test for the work environment variables are detailed in Table 4. Law enforcement and security specialists rated their jobs significantly different in each of the five core dimensions of the Job Diagnostic Survey. Law enforcement specialists rated their job higher than security specialists in every dimension.

The descriptive statistics for the dependent variables are displayed in Table 5. Satisfaction with supervision was the highest-rated facet of job satisfaction. Satisfaction with the work itself was the lowest-rated facet. Again, scores on each facet of the Job Descriptive Index were compared with scores from two civilian police departments. The results of this comparison are also included in Table 5. Air Force security police scored substantially lower than civilian police on the facets, "satisfaction with the work itself" and "satisfaction with co-workers." On the facet, "satisfaction with supervision," Air Force security police scored lower than the Pacific Northwest department, but higher than the Midwestern department.

The results of the t-test for the dependent variables are detailed in Table 6. There was a statistically significant difference in the Job Descriptive Index scores for the facets, "satisfaction with the work itself" and "satisfaction with co-workers." Law enforcement specialists were more satisfied with the work itself and with their co-workers. There was no significant difference in satisfaction with supervision.

Correlations

The correlations between independent variables are presented in Table 7. Among the demographic variables, three variables were found to be highly correlated. Age was strongly correlated with rank ($r = 0.881$) and time in service ($r = 0.932$). The high correlation of these variables can be explained by the recruiting and promotion process of the Air Force. Most enlisted personnel enter the Air Force between the ages of 18 to 20 years. Promotions follow a timeline based on time in service.

Because these independent variables are so strongly correlated, the potential for multicollinearity must be considered when using regression analysis. In this case, severe multicollinearity does exist between the three independent variables. The variance inflation factors are well above the acceptable cut-off of 4.0. ($VIF(\text{age}) = 8.813$; $VIF(\text{rank}) = 6.636$; $VIF(\text{time in service}) = 11.665$) Because of the severe multicollinearity of age, rank, and time in service, only one of these variables (time in service) will be used in the regression analysis.

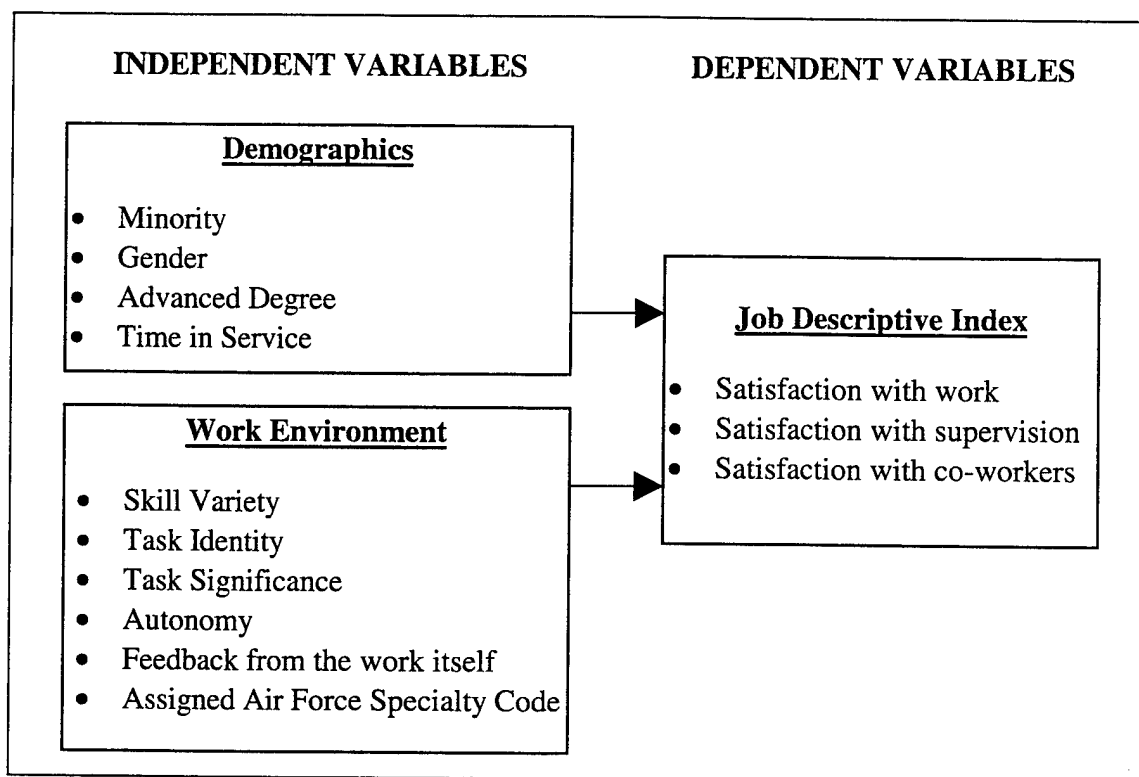
There are statistically significant correlations among all the work environment variables, but the strength of the correlation varies. The variable, “feedback from the work itself,” demonstrates the strongest correlation to each of the other core dimensions of the Job Diagnostic Survey ($r > 0.5$ with each variable). Skill variety is also highly correlated with task identity and autonomy. Task identity is highly correlated with autonomy. Each of the dimensions of the Job Diagnostic Survey is positively correlated with the work of the law enforcement specialist; however, only skill variety is strongly correlated ($r = 0.65$).

Because of the many moderate and high correlations between these independent variables, the potential for multicollinearity must again be considered. In this case there was not a problem with multicollinearity. In all cases, the variance inflation factors were below the criteria of 4.0. Since there was not a problem with multicollinearity, each of the work environment variables could remain in regression analysis.

Although there are several statistically significant correlations between demographic and work environment variables, the magnitudes of these correlations are generally small ($r < 0.275$ for all correlations). There were also no problems with multicollinearity when the demographic and work environment variables were examined together.

Multivariate Regression

The first approach used in the regression analysis emulated the approach of past research (Zhao et al., 1998). The regression analysis was conducted using two models. The first model included only the demographic variables. The second model added the Job Diagnostic Survey variables and the Air Force Specialty Code variable. Each model was used to predict the three facets of the Job Descriptive Index. These regressions are detailed in Tables 8 (satisfaction with work), 9 (satisfaction with supervision), and 10 (satisfaction with co-workers). This approach is graphically depicted in Figure 1.

Figure 1: Regression Model

With each facet of the Job Descriptive Index, the demographic variables had the least explanatory power. In Model 1, the demographic variables only explained 10.5 percent of the variance in satisfaction with work, 2.5 percent of satisfaction with supervision, and 2.5 percent of satisfaction with co-workers. Only one variable had a statistically significant effect on any facet of job satisfaction. Time in service was a statistically significant predictor of satisfaction with work, with a standardized coefficient of 0.351. No demographic variables were statistically significant predictors of satisfaction with supervision or satisfaction with co-workers.

When the work environment variables were added to the regressions, the explanatory power was drastically increased. In Model 2, the demographic and work

environment variables together explained 64.1 percent of the variance in satisfaction with work, 18.0 percent of satisfaction with supervision, and 24.9 percent of satisfaction with co-workers. Several demographic and work environment variables were statistically significant predictors of the three facets of job satisfaction.

Time in service, skill variety, and task significance were statistically significant in the prediction of satisfaction with work. Of these three variables, skill variety was the most important variable, with a standardized coefficient of 0.555. Task significance and time in service were less important predictors, with standardized coefficients of 0.158 and 0.144 respectively.

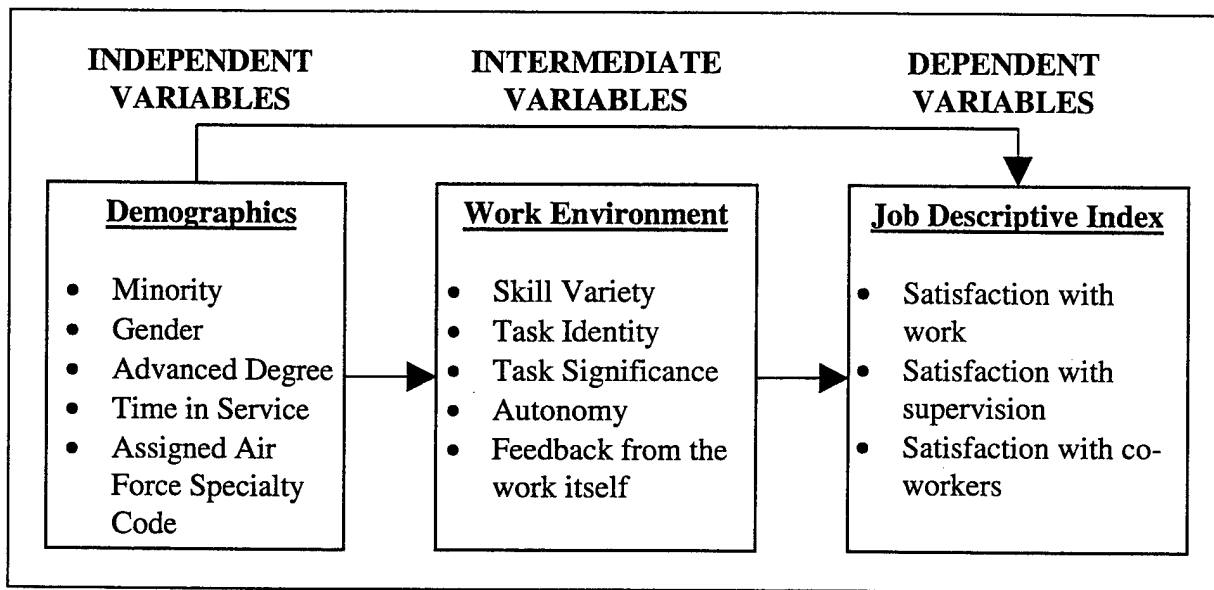
Gender and feedback from the work itself were statistically significant in the prediction of satisfaction with supervision. Of these two variables, feedback from the work itself was the more important variable, with a standardized coefficient of 0.270. Gender had a standardized coefficient of -0.168.

Autonomy was the only statistically significant variable in the prediction of satisfaction with co-workers. It had a standardized coefficient of 0.277.

Based on the first approach to the regression analysis, it appeared that the demographic variables and the assigned Air Force Specialty Code were not important direct predictors of job satisfaction. Instead, it seemed that the demographic variables and the assigned Air Force Specialty Code had an indirect effect on job satisfaction. This effect was mediated by the employee's perceptions of the characteristics of the work environment. These observations resulted in the development of a revision of the

theoretical framework. This new approach used the Job Diagnostic Survey variables as intermediate variables. This revised approach is graphically depicted in Figure 2.

Figure 2: Revised Regression Model



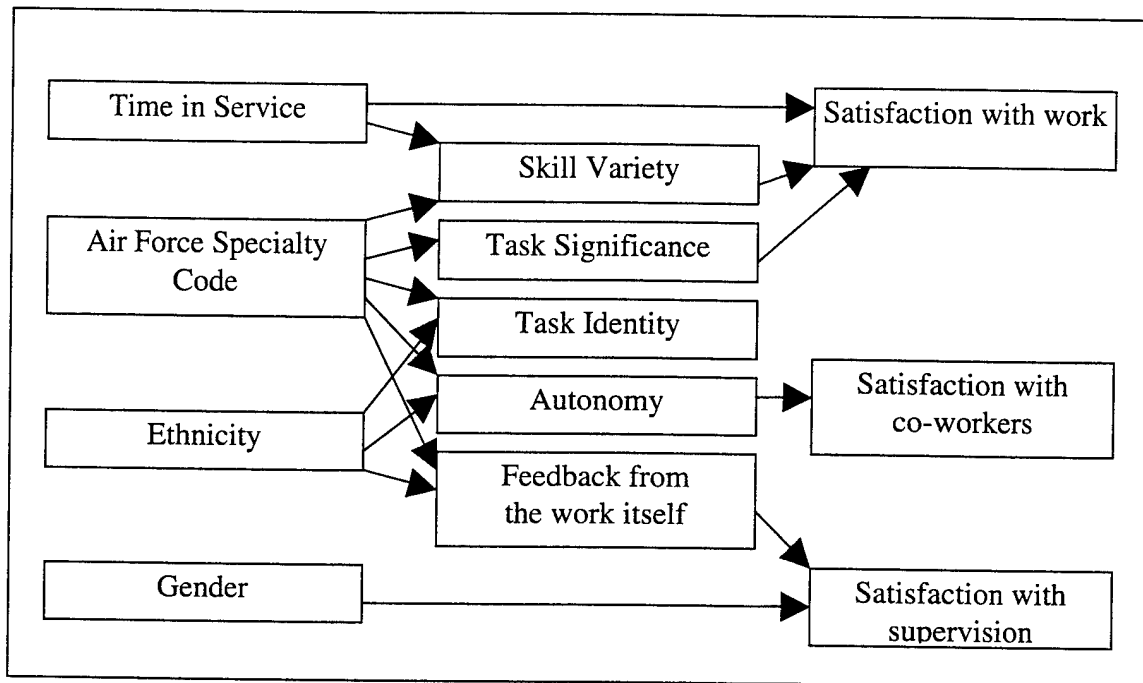
This two-step model hypothesized that the demographic variables and the assigned Air Force Specialty Code would influence the five core dimensions of the Job Diagnostic Survey, which in turn would predict the three facets of the Job Descriptive Index. The data analysis of this two-step model followed the example of Sampson and Laub (1993). In the first step, the demographic variables and the assigned Air Force Specialty Code were used to predict each of the five dimensions of the Job Diagnostic Survey. These regressions, shown in Tables 11 through 15, provided information on the link between the independent variables and the intermediate variables. In the second step, all the independent variables and intermediate variables were used to predict the three dimensions of the Job Descriptive Index. These are the same regressions as those described as Model 2 in Tables 8 through 10. By examining the variables in a two-step

model, the direct and indirect effects of the independent variables on the dependent variables can be separated.

In the first step, the assigned Air Force Specialty Code was found to be a statistically significant predictor of each of the five dimensions of the Job Diagnostic Survey. Two demographic variables were also statistically significant predictors of certain dimensions. Time in service predicted skill variety. Ethnicity predicted task identity, autonomy, and feedback from the work itself. For each dimension, the assigned Air Force Specialty Code was the most important variable, as evidenced by the size of the standardized coefficients. In fact, 42.8 percent of explained variance in skill variety and 21.8 percent of explained variance in autonomy can be attributed to the assigned Air Force Specialty Code, after controlling for all other independent variables. (The percentage can be calculated by multiplying the zero-order correlation between the independent and dependent variable by the standardized coefficient of the independent variable.)

Based on the results of the two sets of regressions, the final regression model is shown in Figure 3. As hypothesized, the two-step model separated the direct and indirect effects of the independent variables on the dependent variables. Most of the direct relationships between the demographic variables and job satisfaction disappeared when the intermediate variables were introduced. Only two direct relationships remained significant. Time in service had a small direct effect on satisfaction with work and gender had a small effect on satisfaction with supervision. However, all the direct effects of the assigned Air Force Specialty Code were absorbed by the intermediate variables.

Figure 3: Final Regression Model



SUMMARY

The two-step regression model demonstrated that most of the demographic variables and the assigned Air Force Specialty Code did not have direct effects on the satisfaction of workers, as measured by the Job Descriptive Index. Instead, the effects of these variables were mediated by the five dimensions of the Job Diagnostic Survey. The most important predictors of satisfaction with work were skill variety and task significance. The only significant predictor of satisfaction with co-workers was autonomy. The most important predictor of satisfaction with supervision was feedback from the work itself. This model has the strongest predictive power with regard to the satisfaction with work, explaining over 64 percent of the variance in this variable.

DISCUSSION

This research began with a theoretical model based on past research about the determinants of job satisfaction. The model (Figure 1) used the characteristics of the work environment and the demographics of the employees to directly predict job satisfaction. This model was successful in explaining a large proportion of the variance in job satisfaction. For example, the model explained 62 percent of the variance in satisfaction with work. However, most of the significant variables were the characteristics of the work environment described by the Job Diagnostic Survey. The demographic variables and the assigned Air Force Specialty Code had only a limited direct effect on job satisfaction.

Based on the initial analysis, a revised theoretical model was adopted (Figure 2). This two-step model included the direct and indirect effects of the demographic variables and the assigned Air Force Specialty Code, as well as the direct effects of the characteristics of the work environment. The revised model was supported by the analysis of the data. The demographic variables and assigned Air Force Specialty Code had significant indirect effects on job satisfaction, as mediated by the perceived characteristics of the work environment.

DIRECT AND INDIRECT EFFECTS OF WORK ENVIRONMENT VARIABLES

The characteristics of the work environment proved to be the most significant predictors of each facet of job satisfaction. These variables had significant direct effects on job satisfaction. Skill variety and task significance were important predictors of

satisfaction with work. Autonomy was an important predictor of satisfaction with co-workers. Feedback from the work itself was an important predictor of satisfaction with supervision. Task identity was not an important predictor of any facet of job satisfaction.

Skill variety was clearly the most important factor identified in this research. This variable had the greatest impact on satisfaction with work. The other important characteristic of the work environment was task significance. The importance of these two variables in relation to satisfaction to work was reflected in the comments of those interviewed. A law enforcement technical sergeant enjoyed his job because of the variety of tasks he was called upon to perform each day. A law enforcement master sergeant also enjoyed his job because of the variety, as well as the importance of "serving his country and making a difference." On the other hand, a security specialist with 10 years experience commented on the lack of progression and variety in his job: "I do the same thing (now) that I did as an airman." A law enforcement airman expressed great dissatisfaction with his job because of the lack of variety: "All security police are just glorified mall security guards."

These comments support the statistical findings: the variety of skills required to do the job and the perceived importance of that job are the most crucial factors in predicting satisfaction with work. This holds true for both law enforcement and security specialists. The assigned Air Force Specialty Code does not directly predict job satisfaction. Instead, the perceived characteristics of the work environment are the important factors.

The comparison of law enforcement and security specialists in Table 3 clearly demonstrates that law enforcement specialists are more satisfied with every facet of their job than their security counterparts. However, there is not a direct relationship between the assigned Air Force Specialty Code and job satisfaction. Instead, the effects of the assigned Air Force Specialty Code are mediated by the characteristics of the work environment. Each of the five dimensions of the work environment is strongly influenced by the assigned Air Force Specialty Code (See Figure 3).

The implication of this data is that law enforcement specialists will not always be satisfied and security specialists always dissatisfied. For both groups, the important factors are the perceived characteristics of the work environment. This point will be important as the Air Force undertakes a major transition in the security police career field.

DIRECT AND INDIRECT EFFECTS OF DEMOGRAPHIC VARIABLES

The finding that demographic variables have little direct impact on job satisfaction contradicts a substantial body of literature. However, this research found only two cases where a demographic variable had a statistically significant direct effect on job satisfaction. (Gender affected satisfaction with supervision and time in service affected satisfaction with work.) Instead, the demographic variables had an indirect effect through the mediation of the characteristics of the work environment.

The lack of a direct effect of gender or ethnicity on job satisfaction may seem surprising in light of past research in civilian police organizations that found women and ethnic minority groups were often less satisfied than the white male majority (e.g.,

Buzawa, 1984; Buzawa et al., 1994; Dantzker, 1994). However, some of these studies also found that in those departments with a greater percentage of women or ethnic minority groups, the levels of satisfaction were equal or higher than the majority group (Buzawa, 1984; Buzawa et al., 1994). This may be the case for the United States Air Force. As an organization, the Air Force has been on the leading edge of American society in the integration of women and ethnic minority groups. Women and ethnic minority groups are both well represented in the Air Force. Female security police interviewed during the research felt that their gender was not a factor in their job satisfaction. "We are treated just the same as the guys," stated one female security specialist. Ethnicity was also absent from the list of factors affecting satisfaction. Strong policies against sexual and racial discrimination seem to have eliminated most of the direct impact of gender and ethnicity on job satisfaction.

A small, but statistically significant, direct relationship was found between gender and satisfaction with supervision. Women had higher levels of satisfaction with supervision than men. This direct effect may be a result of Air Force supervisors exceeding the expectations of female workers in a traditionally male-dominated career field. By treating men and women equally, the supervisors may better satisfy the female employees because some female employees will expect to be treated unfairly in a male-dominated military. However, it is important to consider that this result is based on a very small sample of women ($N=6$).

The second direct effect was that time in service was positively related to job satisfaction. This direct effect could reflect an increase in satisfaction due to maturity or

pay increases. This also could be a statistical reflection of a process of self-selection: Those employees who are least satisfied with the job choose to leave the Air Force, thus increasing the average satisfaction score for those who remain in the service. Regardless of the source, the direct effect of time in service was less important than its indirect effect through the intermediate variable, skill variety (discussed below).

Although the demographic variables did not have many direct effects on job satisfaction, these variables are important because of their indirect effects through the intermediate variables. Two demographic variables had significant indirect effects through the intermediate variables. First, time in service affected the perception of skill variety. Second, ethnicity affected the perception of autonomy, task identity, and feedback from the work itself.

The relationship between time in service and skill variety reflects the progression of an employee in the Air Force security police career field. The first job assigned to most law enforcement specialists is installation entry controller, or gate guard. For a new security specialist, the first assignment is often a close boundary sentry. The variety of tasks required for these two positions is relatively low. Over time, the employee progresses to more varied assignments. For the law enforcement specialist, the gate guard may advance to the position of patrolman or desk sergeant (equivalent to a civilian police dispatcher). The security specialist may advance to become a restricted area entry controller or an alarm response team member. The variety of tasks for these advanced positions is greater than that of the entry-level positions.

The relationship between ethnicity and autonomy, task identity, and feedback from the work itself is more difficult to explain. In each case, members of ethnic minority groups had a more favorable perception of these three characteristics of the work environment. One possible explanation is that the civilian employment prospects for minority groups are less favorable than those for the white majority. A job with the Air Force security police may seem more attractive to a member of a minority group when compared with the civilian job opportunities available to that group. A member of a minority group would have a more favorable perception of the characteristics of the work environment based on the employment expectations of that group. This theory would be supported by research that found higher levels of job satisfaction in the military among ethnic minority groups (Jones et al., 1977; Shiflett, 1988).

SUMMARY

The original theoretical model examined only the direct effects of the independent variables. While the overall explanatory power of this model was excellent, many of the key variables had little or no direct effect on job satisfaction. This led to a revision of the theoretical model that allowed for the indirect effects of the independent variables, as mediated by the intermediate variables. Using this revised model, it became apparent that the demographic variables and the assigned Air Force Specialty Code had indirect effects on job satisfaction, while the perceived characteristics of the work environment had direct effects on job satisfaction.

Several important findings can be drawn from the results of this research. First, the characteristics of the work environment are the most important direct determinants of job satisfaction. These variables also mediate the effects of the demographic variables. Second, demographic variables do not appear to have a significant direct impact on job satisfaction. However, these variables do have an indirect effect on job satisfaction through a set of intermediate variables (the characteristics of the work environment). Third, assignment to the law enforcement or security specialty does not have a direct effect on job satisfaction. Instead, there is an indirect effect mediated by the perceived characteristics of the work environment.

CONCLUSION

Job satisfaction is an important issue in the administration of any organization. Much research has been conducted to determine the factors that make the greatest contribution to job satisfaction. The variables used in much of this research can be divided into two primary groups: demographic variables and characteristics of the work environment. In police-specific research, more attention has been given to the demographic variables as predictors of job satisfaction. However, the explanatory value of these variables has been limited. Recent research using the characteristics of the work environment has been more successful in predicting job satisfaction.

This research set out to examine the factors affecting the job satisfaction of security police in the United States Air Force. This group provided a unique opportunity to test the utility of work environment variables as predictors of job satisfaction while holding the demographic variables constant. The security police career field includes two primary specialties, law enforcement and security. While the personnel working in these Air Force Specialty Codes are demographically similar, the work environments of the two groups are drastically different.

Law enforcement specialists perform many traditional police functions, including preventive patrol, order maintenance, crime prevention, and traffic control. Individuals perform a wide variety of police tasks and have significant authority and autonomy on the job. In comparison, security specialists control entry to restricted areas, respond to alarms, and stand guard around critical Air Force resources (primarily aircraft and

missiles). The tasks performed each day are generally monotonous and routine. Strict security regulations leave no room for individual autonomy or discretion.

These factors produced an interesting source of information on the determinants of job satisfaction. The characteristics of the individuals in the law enforcement and security specialties are virtually identical, yet the work environment variables are dramatically different. By examining the differences in the levels of job satisfaction among these two groups, the relative contributions of individual characteristics and the work environment to job satisfaction could be determined.

A model was developed to examine how the demographic and work environment variables affected job satisfaction. However, a simple model of independent and dependent variables did not fully capture the dynamics involved. A revised model was developed using the demographic variables and assigned Air Force Specialty Code as independent variables, the characteristics of the work environment as intermediate variables, and job satisfaction as the dependent variable. This model provided a more detailed explanation of the relative contributions of the variables to job satisfaction and also separated the direct and indirect effects of the variables.

In the final model, the demographic variables had very little direct impact on the facets of job satisfaction. Instead these variables indirectly affected satisfaction through the mediating effects of the characteristics of the work environment. The assigned Air Force Specialty Code also lacked a direct effect on the level of satisfaction, but had a significant indirect effect through each of the five dimensions of the work environment.

The characteristics of the work environment had the greatest direct effect on the levels of job satisfaction. Specifically, the perceived amount of skill variety in the job was the single most important factor in the satisfaction with work. Task significance, autonomy, and feedback from the work itself all had effects on some facet of job satisfaction. Among the five dimensions of the work environment, only task identity had no significant effect on job satisfaction.

The results of this research have application in the future of the Air Force security police. As mentioned in the introduction, the Air Force is in the process of combining the law enforcement and security specialties. The implementation of this change could have a tremendous impact on the job satisfaction of the personnel who worked as either law enforcement or security specialists in the past. There is a potential to increase the satisfaction of many workers by applying the findings of this research.

The impact of the merger on job satisfaction will depend greatly on the perceived work environment of the job after the changes have been fully implemented. Since the most important factor affecting job satisfaction was skill variety, it may be possible to increase job satisfaction through increasing skill variety. Security personnel, who previously spent entire work shifts monitoring a fenceline or checking security badges, could be given the opportunity to learn a variety of law enforcement tasks. If former security specialists are assigned a wider variety of tasks, their job satisfaction should increase. On the other hand, law enforcement personnel, who previously enjoyed the variety of police work, could spend some work shifts performing monotonous, routinized tasks. If former law enforcement specialists find the scope of their skill variety is

reduced, their job satisfaction may decrease. Improving the overall job satisfaction of the entire group may have an unintended consequence of lowering the job satisfaction of some members.

Future research efforts in the area of job satisfaction could use a similar survey instrument to measure the same variables among Air Force security police several years after the merger of career fields. This research could assess whether the Air Force was successful in improving skill variety and other characteristics of the work environment.

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TABLE 1: Descriptive Statistics for Demographic Variables**Frequencies****Ethnicity (N=135)**

White (Non-Hispanic)	102	75.6 %
Black (Non-Hispanic)	20	14.8 %
Hispanic	3	2.2 %
American Indian	3	2.2 %
Asian/Asian-American/Pacific Islander	2	1.5 %
Other	5	3.7 %

Gender (N=135)

Male	129	95.6 %
Female	6	4.4 %

Age (N=135)

20-25 years	69	51.1 %
26-30 years	27	20.0 %
31-35 years	19	14.1 %
36-42 years	20	14.8 %

Rank (N=135)

E-2 (Airman)	3	2.2 %
E-3 (Airman First Class)	32	23.7 %
E-4 (Senior Airman)	42	29.6 %
E-5 (Staff Sergeant)	33	24.4 %
E-6 (Technical Sergeant)	17	12.6 %
E-7 (Master Sergeant)	8	5.9 %

Time in Service (N=135)

0 - 24 months	25	18.5 %
25 - 48 months	37	27.4 %
49 - 120 months	31	23.0 %
121 - 180 months	25	18.5 %
181 months or more	17	12.6 %

TABLE 1 (continued)**Education Level (N=135)**

High School Graduate or GED	30	22.2 %
Some college	75	55.6 %
Associate Degree	19	14.1 %
Bachelor Degree	8	5.9 %
Some graduate course work	2	1.5 %
Graduate Degree	1	0.7 %

Means

Variable	N	Min	Max	Mean	Std Dev
Ethnicity (0 = White; 1 = Minority)	135	0	1	0.244	0.431
Gender (0 = Male; 1 = Female)	135	0	1	0.044	0.207
Age (Years)	135	20	42	27.16	6.14
Rank	135	2	7	4.39	1.21
Time in Service (Months)	135	1	261	87.07	67.92
Education Level (0 = No college degree; 1 = Associate Degree or higher)	135	0	1	0.222	0.417

TABLE 2: Comparison of Law Enforcement and Security Personnel Based on Demographic Variables

Variable	Group	N	Mean	Std Dev	Statistically Significant ($p < 0.05$)
Ethnicity (0 = White; 1 = Minority)	LE	44	0.1364	0.347	YES
	Security	91	0.2967	0.459	
Gender (0 = Male; 1 = Female)	LE	44	0.0227	0.15	NO
	Security	91	0.0549	0.23	
Age (Years)	LE	44	28.59	6.25	NO
	Security	91	26.46	6.00	
Rank	LE	44	4.66	1.33	NO
	Security	91	4.26	1.13	
Time in Service (Months)	LE	44	106.32	74.07	YES
	Security	91	77.76	63.07	
Education Level (0 = No college degree; 1 = Associate Degree or higher)	LE	44	0.34	0.48	YES
	Security	91	0.16	0.37	

TABLE 3: Descriptive Statistics for Work Environment Variables

Air Force Specialty Code		
Variable	N	%
Security Specialist	91	67.4 %
Law Enforcement Specialist	44	32.6 %

Job Diagnostic Survey Scales

Variable	N	Min	Max	Mean	Std Dev
Skill Variety	135	1	7	2.7802	1.6028
Task Identity	135	1	7	3.8765	1.4933
Task Significance	135	1	7	5.4691	1.3166
Autonomy	135	1	7	3.6963	1.5456
Feedback from the work itself	135	1	7	3.7457	1.4085

Comparison of Air Force and Civilian Police

	Air Force Security Police			Civilian Police	
	Overall (N=135)	Law Enforcement (N=44)	Security (N=91)	Police Dept. A (N=199)	Police Dept. B (N=92)
Skill Variety	2.78	4.27	2.06	5.49	5.26
Task Identity	3.88	4.61	3.52	4.11	4.46
Task Significance	5.47	5.89	5.26	5.73	5.79
Autonomy	3.70	4.67	3.23	5.59	5.48
Feedback from the work itself	3.75	4.45	3.40	4.73	4.49

Data for Dept. A from Zhao et al. (1998). Data for Dept. B from Zhao (1997).

TABLE 4: Comparison of Law Enforcement and Security Personnel Based on Work Environment Variables

Job Diagnostic Survey Scales					
Variable	Group	N	Mean	Std Dev	Statistically Significant (p < 0.05)
Skill Variety	LE	44	4.273	1.413	YES
	Security	91	2.059	1.121	
Task Identity	LE	44	4.606	1.119	YES
	Security	91	3.524	1.528	
Task Significance	LE	44	5.894	1.247	YES
	Security	91	5.264	1.307	
Autonomy	LE	44	4.667	1.228	YES
	Security	91	3.227	1.467	
Feedback from the work itself	LE	44	4.455	1.276	YES
	Security	91	3.403	1.346	

TABLE 5: Descriptive Statistics for the Dependent Variables**Job Descriptive Index Scales**

Variable	N	Min	Max	Mean	Std Dev
Satisfaction with work	135	0	44	15.53	11.18
Satisfaction with supervision	135	6	54	38.57	12.89
Satisfaction with co-workers	135	0	54	30.86	14.60

Comparison of Air Force and Civilian Police

	Air Force Security Police				
	Overall (N=135)	Law Enforcement (N=44)	Security (N=91)	Police Dept. A (N=199)	Police Dept. B (N=92)
Satisfaction with work	15.53	22.59	12.12	33.20	32.0
Satisfaction with supervision	38.57	40.86	37.46	41.64	34.0
Satisfaction with co-workers	30.86	36.45	28.15	44.19	43.0

Data for Dept. A from Zhao et al. (1998). Data for Dept. B from Zhao (1997).

TABLE 6: Comparison of Law Enforcement and Security Personnel Based on Work Environment Variables

Job Descriptive Index Scales					
Variable	Group	N	Mean	Std Dev	Statistically Significant (p < 0.05)
Satisfaction with work	LE	44	22.591	11.566	YES
	Security	91	12.121	9.275	
Satisfaction with supervision	LE	44	40.864	13.025	NO
	Security	91	37.462	12.754	
Satisfaction with co-workers	LE	44	36.455	15.133	YES
	Security	91	28.154	13.613	

TABLE 7: Correlation Matrix of Independent Variables

	1	2	3	4	5	6	7	8	9	10	11	12
1	1.000											
2	.045	1.000										
3	.191	-.094	1.000									
4	.158	-.011	.881	1.000								
5	.104	-.058	.932	.915	1.000							
6	.028	.058	.304	.299	.258	1.000						
7	.003	-.068	.273	.230	.275	.059	1.000					
8	.167	.123	.162	.185	.155	.076	.500	1.000				
9	.037	-.041	.166	.188	.202	.044	.395	.263	1.000			
10	.116	.058	.166	.127	.161	.036	.718	.545	.465	1.000		
11	.144	.039	.177	.152	.151	-.013	.576	.538	.531	.595	1.000	
12	-.175	-.073	.163	.154	.198	.199	.650	.341	.225	.438	.351	1.000

Probability of statistical significance (2-tailed)

	1	2	3	4	5	6	7	8	9	10	11	12
1	-											
2	.607	-										
3	.026	.280	-									
4	.067	.903	.000	-								
5	.232	.507	.000	.000	-							
6	.750	.507	.000	.000	.003	-						
7	.975	.434	.001	.007	.001	.499	-					
8	.053	.157	.061	.031	.073	.379	.000	-				
9	.666	.640	.054	.029	.019	.610	.000	.002	-			
10	.181	.503	.054	.143	.063	.679	.000	.000	.000	-		
11	.096	.653	.040	.078	.081	.880	.000	.000	.000	.000	-	
12	.042	.398	.059	.075	.021	.021	.000	.000	.009	.000	.000	-

Demographic Variables

- 1) Minority
- 2) Gender
- 3) Age
- 4) Rank
- 5) Time in service
- 6) Advanced Degree

Work Environment Variables

- 7) Skill Variety
- 8) Task Identity
- 9) Task Significance
- 10) Autonomy
- 11) Feedback from the work itself
- 12) Air Force Specialty Code

TABLE 8: Regression Analysis**Dependent Variable: Satisfaction with Work**

Model	Variables Entered
1	MINORITY, GENDER, ADV DEGREE, TIMESERV
2	MINORITY, GENDER, ADV DEGREE, TIMESERV, SIGN, IDENT, AUTO, FEED, SKILL, JOBGIVEN

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.351	.123	.096	10.6281
2	.801	.641	.612	6.9614

Model 1	Unstandardized Coefficients		Standardized Coefficients		Sig.	Collinearity Statistics	
	B	Std. Error	Beta	t		Tolerance	VIF
(Constant)	10.422	1.573		6.628	.000		
MINORITY	1.462	2.143	.056	.682	.496	.987	1.013
GENDER	.731	4.464	.014	.164	.870	.988	1.012
ADV DEGREE	-1.367	2.284	-.051	-.599	.550	.928	1.077
TIMESERV	.05772	.014	.351	4.092	.000	.918	1.089

Model 2	Unstandardized Coefficients		Standardized Coefficients		Sig.	Collinearity Statistics	
	B	Std. Error	Beta	t		Tolerance	VIF
(Constant)	-9.571	2.795		-3.424	.001		
MINORITY	.962	1.494	.037	.644	.521	.871	1.148
GENDER	1.656	3.000	.031	.552	.582	.939	1.065
ADV DEGREE	-.917	1.540	-.034	-.596	.552	.876	1.142
TIMESERV	.02368	.010	.144	2.444	.016	.835	1.197
SKILL	3.872	.679	.555	5.705	.000	.306	3.272
IDENT	.104	.523	.014	.199	.843	.593	1.688
SIGN	1.342	.565	.158	2.377	.019	.655	1.527
AUTO	1.070	.627	.148	1.706	.090	.385	2.597
FEED	.227	.623	.029	.364	.717	.469	2.131
JOBGIVEN	-1.148	1.783	-.048	-.644	.521	.514	1.947

TABLE 9: Regression Analysis**Dependent Variable: Satisfaction with Supervision**

Model	Variables Entered
1	MINORITY, GENDER, ADV DEGREE, TIMESERV
2	MINORITY, GENDER, ADV DEGREE, TIMESERV, SIGN, IDENT, AUTO, FEED, SKILL, JOBGIVEN

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.159	.025	.005	12.9242
2	.425	.180	.114	12.1352

Model 1	Unstandardized Coefficients		Standardized Coefficients		Sig.	Collinearity Statistics	
	B	Std. Error	Beta	t		Tolerance	VIF
(Constant)	38.035	1.912		19.89	.000		
MINORITY	-1.020	2.606	-.034	-.392	.696	.987	1.013
GENDER	-7.726	5.429	-.124	-1.423	.157	.988	1.012
ADV DEGREE	-1.246	2.777	-.040	-.449	.654	.928	1.077
TIMESERV	.01614	.017	.085	.941	.349	.918	1.089

Model 2	Unstandardized Coefficients		Standardized Coefficients		Sig.	Collinearity Statistics	
	B	Std. Error	Beta	t		Tolerance	VIF
(Constant)	21.443	4.872		4.401	.000		
MINORITY	-3.435	2.604	-.115	-1.319	.189	.871	1.148
GENDER	-10.488	5.230	-.168	-2.005	.047	.939	1.065
ADV DEGREE	-.577	2.685	-.019	-.215	.830	.876	1.142
TIMESERV	.00587	.017	.031	.348	.729	.835	1.197
SKILL	-.877	1.183	-.109	-.741	.460	.306	3.272
IDENT	1.128	.912	.131	1.237	.218	.593	1.688
SIGN	.561	.984	.057	.570	.570	.655	1.527
AUTO	1.153	1.093	.138	1.055	.293	.385	2.597
FEED	2.471	1.087	.270	2.274	.025	.469	2.131
JOBGIVEN	-1.444	3.109	-.053	-.465	.643	.514	1.947

TABLE 10: Regression Analysis**Dependent Variable: Satisfaction with Co-Workers**

Model	Variables Entered
1	MINORITY, GENDER, ADV DEGREE, TIMESERV
2	MINORITY, GENDER, ADV DEGREE, TIMESERV, SIGN, IDENT, AUTO, FEED, SKILL, JOBGIVEN

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.157	.025	-.005	14.6405
2	.499	.249	.189	13.1517

Model 1	Unstandardized Coefficients		Standardized Coefficients		Sig.	Collinearity Statistics	
	B	Std. Error	Beta	t		Tolerance	VIF
(Constant)	29.316	2.166		13.53	.000		
MINORITY	-1.598	2.952	-.047	-.541	.589	.987	1.013
GENDER	-4.124	6.150	-.058	-.671	.504	.988	1.012
ADV DEGREE	-2.147	3.146	-.061	-.683	.496	.928	1.077
TIMESERV	.02980	.019	.139	1.533	.128	.918	1.089

Model 2	Unstandardized Coefficients		Standardized Coefficients		Sig.	Collinearity Statistics	
	B	Std. Error	Beta	t		Tolerance	VIF
(Constant)	9.320	5.280		1.765	.080		
MINORITY	-2.511	2.822	-.074	-.890	.375	.871	1.148
GENDER	-4.553	5.669	-.064	-.803	.423	.939	1.065
ADV DEGREE	-1.881	2.910	-.054	-.647	.519	.876	1.142
TIMESERV	.00803	.018	.037	.439	.662	.835	1.197
SKILL	.291	1.282	.032	.227	.821	.306	3.272
IDENT	-.812	.988	-.083	-.822	.413	.593	1.688
SIGN	1.439	1.066	.130	1.349	.180	.655	1.527
AUTO	2.621	1.185	.277	2.213	.029	.385	2.597
FEED	1.689	1.178	.163	1.434	.154	.469	2.131
JOBGIVEN	1.633	3.369	.053	.485	.629	.514	1.947

TABLE 11: Regression Analysis**Dependent Variable: Skill Variety****Model Variables Entered**

1 MINORITY, GENDER, ADV DEGREE, TIMESERV, JOBGIVEN

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.683	.467	.446	1.1928

Model 1	Unstandardized Coefficients		Standardized Coefficients		Sig.	Collinearity Statistics	
	B	Std. Error	Beta	t		Tolerance	VIF
(Constant)	1.720	.185		9.299	.000		
MINORITY	.388	.245	.104	1.582	.116	.947	1.056
GENDER	-.0630	.502	-.008	-.126	.900	.984	1.016
ADV DEGREE	-.448	.260	-.117	-1.724	.087	.903	1.107
TIMESERV	.00386	.002	.164	2.404	.018	.891	1.122
JOBGIVEN	2.243	.232	.658	9.687	.000	.895	1.118

TABLE 12: Regression Analysis**Dependent Variable: Task Identity****Model Variables Entered**

1 MINORITY, GENDER, ADV DEGREE, TIMESERV, JOBGIVEN

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.440	.194	.163	1.3664

Model 1	Unstandardized Coefficients		Standardized Coefficients		Sig.	Collinearity Statistics	
	B	Std. Error	Beta	t		Tolerance	VIF
(Constant)	3.133	.212		14.78	.000		
MINORITY	.763	.281	.221	2.715	.008	.947	1.056
GENDER	1.061	.575	.147	1.843	.068	.984	1.016
ADV DEGREE	-.118	.298	-.033	-.398	.692	.903	1.107
TIMESERV	.00161	.002	.073	.876	.383	.891	1.122
JOBGIVEN	1.214	.265	.382	4.576	.000	.895	1.118

TABLE 13: Regression Analysis**Dependent Variable: Task Significance****Model Variables Entered**

1 MINORITY, GENDER, ADV DEGREE, TIMESERV, JOBGIVEN

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.285	.081	.046	1.2861

Model 1	Unstandardized Coefficients		Standardized Coefficients		Sig.	Collinearity Statistics	
	B	Std. Error	Beta	t		Tolerance	VIF
(Constant)	4.990	.199		25.02	.000		
MINORITY	.180	.265	.059	.681	.497	.947	1.056
GENDER	-.102	.541	-.016	-.189	.850	.984	1.016
ADV DEGREE	-.127	.280	-.040	-.454	.651	.903	1.107
TIMESERV	.00318	.002	.164	1.833	.069	.891	1.122
JOBGIVEN	.587	.250	.210	2.353	.020	.895	1.118

TABLE 14: Regression Analysis**Dependent Variable: Autonomy****Model Variables Entered**

1 MINORITY, GENDER, ADV DEGREE, TIMESERV, JOBGIVEN

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.497	.247	.218	1.3667

Model 1	Unstandardized Coefficients		Standardized Coefficients		Sig.	Collinearity Statistics	
	B	Std. Error	Beta	t		Tolerance	VIF
(Constant)	2.909	.212		13.72	.000		
MINORITY	.683	.281	.191	2.430	.016	.947	1.056
GENDER	.705	.575	.094	1.225	.223	.984	1.016
ADV DEGREE	-.331	.298	-.089	-1.112	.268	.903	1.107
TIMESERV	.00169	.002	.074	.916	.361	.891	1.122
JOBGIVEN	1.582	.265	.482	5.963	.000	.895	1.118

TABLE 15: Regression Analysis**Dependent Variable: Feedback from the work itself****Model Variables Entered**

1 MINORITY, GENDER, ADV DEGREE, TIMESERV, JOBGIVEN

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.433	.188	.156	1.2939

Model 1	Unstandardized Coefficients		Standardized Coefficients		Sig.	Collinearity Statistics	
	B	Std. Error	Beta	t		Tolerance	VIF
(Constant)	3.107	.201		15.48	.000		
MINORITY	.670	.266	.205	2.517	.013	.947	1.056
GENDER	.486	.545	.071	.893	.374	.984	1.016
ADV DEGREE	-.421	.282	-.125	-1.494	.138	.903	1.107
TIMESERV	.00180	.002	.087	1.032	.304	.891	1.122
JOBGIVEN	1.197	.251	.400	4.768	.000	.895	1.118

APPENDIX

SECURITY POLICE WORK SATISFACTION SURVEY

This survey examines the relationship of several factors on your job satisfaction. These factors include the work you perform, the supervision you receive, your immediate work group, the overall organization, and your values.

Thank you for taking the time to complete this survey. Your responses are anonymous. All individual responses will be kept confidential and will only be used by the researcher. The summarized responses may be released to the public.

DEMOGRAPHIC INFORMATION

Age: _____

Gender: Male
 Female

Rank: E-1 E-5
 E-2 E-6
 E-3 E-7
 E-4

Ethnicity: ☐ American Indian
 ☐ Black (Non-Hispanic)
 ☐ White (Non-Hispanic)
 ☐ Hispanic
 ☐ Asian/Asian-American/Pacific Islander
 ☐ Other

Education Level: Please check the **highest** level of education you have completed:

☐ High School Graduate or GED

☐ Some college course work beyond automatic CCAF credits (Degree not completed)

☐ Associate Degree

☐ Bachelor Degree

☐ Some graduate course work (Degree not completed)

☐ Graduate Degree

Time in Service: When did you arrive at your first duty station in the Air Force?
_____, 19__ (Month, Year)

AFSC Choice: When you first entered the Air Force, what career field option did you choose?

☐ Guaranteed Law Enforcement ☐ Guaranteed Security ☐ Open/General

AFSC Assigned: When you first entered the Air Force, to what career field were you assigned?

____ Law Enforcement ____ Security ____ Other: ____

Survey Control Number: USAF SCN 97-19

WORK ENVIRONMENT

SECTION 1: This section is concerned with the characteristics of your job. This does not include how much you like or dislike your job.

Please circle the number that most accurately describes your job.

1. To what extent does your job require you to *work closely with other people* in related jobs in your own organization?

1-----2-----3-----4-----5-----6-----7

Very little; dealing
with other people
is not at all necessary
in doing the job

Moderately; some
dealing with others
is necessary

Very much; dealing
with other people is
an absolutely essential
part of doing the job

2. How much *autonomy* is there in your job? That is, to what extent does your job permit you to decide on your own how to go about doing the work?

1-----2-----3-----4-----5-----6-----7

Very little; the job
gives me almost no
personal "say" about
how and when the
work is done

Moderate autonomy;
many things are
standardized and not
under my control, but I
can make some decisions
about the work

Very much; the job
gives me almost
complete responsibility
for deciding how and
when the work is done

3. To what extent does your job involve doing a "whole" and identifiable piece of work? That is, is the job a complete piece of work that has an obvious beginning and end? Or is it only a small part of the overall piece of work, which is finished by other people or by automated machines?

1-----2-----3-----4-----5-----6-----7

My job is only a tiny
part of the overall
work; the results of my
activities cannot be seen
in the final product or
service

My job is a moderate
sized "chunk" of the
overall piece of work;
my own contribution
can be seen in the
final outcome

My job involves doing
the whole piece of work
from start to finish; the
results of my activity are
easily seen in the final
product or service

4. How much *variety* is there in your job? That is, to what extent does the job require you to do many different things at work, using a variety of your skills and talent?

1-----2-----3-----4-----5-----6-----7

Very little; the job
requires me to do the
same routine things
over and over again

Moderate variety

Very much; the job
requires me to do
many different things,
using a number of
different skills and talent

5. In general, how *significant* or *important* is your job? That is, are the results of your work likely to significantly affect the lives or well-being of other people?

1-----2-----3-----4-----5-----6-----7

Not very significant;
the outcomes of my
work are not likely to
have important effects
on other people

Moderately significant

Highly significant;
the outcomes of my
work can affect other
people in very important
ways

6. To what extent do *managers* or *co-workers* let you know how well you are doing on your job?

1-----2-----3-----4-----5-----6-----7

Very little; people
almost never let me
know how well I
am doing

Moderate; sometimes
people give me feedback,
other times they
may not

Very much; the managers
or co-workers provide me
almost constant feedback
about how well I am doing

7. To what extent does doing the *job itself* provide you with information about your work performance? That is, does the actual work itself provide clues about how well you are doing—aside from any feedback co-workers or supervisors may provide?

1-----2-----3-----4-----5-----6-----7

Very little; the job itself
is set up so I could
work forever without
knowing how well I
am doing

Moderately; sometimes
doing the job provides
feedback to me;
sometimes it does not

Very much; the job is
set up so that I get
almost constant feedback
as I work about how well
I am doing

SECTION 2: Listed below are a number of statements which could describe a job. Please rate each statement as an *accurate* or *inaccurate* description of your job.

Please write a number beside each statement based on the following scale.

- | | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
|--|------------|------------|------------|-----------|----------|----------|----------|
| | Very | Mostly | Slightly | Uncertain | Slightly | Mostly | Very |
| | Inaccurate | Inaccurate | Inaccurate | | Accurate | Accurate | Accurate |
-
- ___ 1. The job requires me to use a number of complex or high-level skills.
 - ___ 2. The job requires a lot of cooperative work with other people.
 - ___ 3. The job is arranged so that I do not have the chance to do an entire piece of work from beginning to end.
 - ___ 4. Just doing the work required by the job provides many chances for me to figure out how well I am doing.
 - ___ 5. The job is quite simple and repetitive.
 - ___ 6. The job can be done adequately by a person working alone, without talking to or checking with other people.
 - ___ 7. The supervisors and co-workers on this job almost never give me any feedback about how well I am doing in my work.
 - ___ 8. This job is one where a lot of people can be affected by how well the work gets done.
 - ___ 9. The job denies me any chance to use my personal initiative or judgment in carrying out the work.
 - ___ 10. Supervisors often let me know how well they think I am performing the job.
 - ___ 11. The job provides me the chance to completely finish the pieces of work I begin.
 - ___ 12. The job itself provides very few clues about whether or not I am performing well.
 - ___ 13. The job gives me considerable opportunity for independence and freedom in how I do the work.
 - ___ 14. The job itself is not very significant or important in the broader scheme of things.

JOB OPINIONS

SECTION 3: In this section, describe how you feel about your job. The questions are divided into three areas: the work itself, your supervisors, and your co-workers. Under each area is a list of words that could describe your job.

Place a 1 next to each word that describes your job.

Place a 2 next to each word that does not describe your job.

Place a 3 next to each word if you can't decide

WORK: Think of your *present work*. What is it like most of the time?

- | | |
|--------------------------------------|--|
| <input type="checkbox"/> Fascinating | <input type="checkbox"/> Useful |
| <input type="checkbox"/> Routine | <input type="checkbox"/> Tiresome |
| <input type="checkbox"/> Satisfying | <input type="checkbox"/> Healthful |
| <input type="checkbox"/> Boring | <input type="checkbox"/> Challenging |
| <input type="checkbox"/> Good | <input type="checkbox"/> On your feet |
| <input type="checkbox"/> Creative | <input type="checkbox"/> Frustrating |
| <input type="checkbox"/> Respected | <input type="checkbox"/> Simple |
| <input type="checkbox"/> Hot | <input type="checkbox"/> Endless |
| <input type="checkbox"/> Pleasant | <input type="checkbox"/> Gives sense of accomplishment |

SUPERVISION: Think of the kind of management you have on your job. How well does each of the following words describe this *supervision*? (Your immediate supervisor)

- | | |
|---|---|
| <input type="checkbox"/> Asks my advice | <input type="checkbox"/> Tells me where I stand |
| <input type="checkbox"/> Hard to please | <input type="checkbox"/> Annoying |
| <input type="checkbox"/> Impolite | <input type="checkbox"/> Stubborn |
| <input type="checkbox"/> Praises good work | <input type="checkbox"/> Knows job well |
| <input type="checkbox"/> Tactful | <input type="checkbox"/> Bad |
| <input type="checkbox"/> Influential | <input type="checkbox"/> Intelligent |
| <input type="checkbox"/> Up-to-date | <input type="checkbox"/> Leaves me on my own |
| <input type="checkbox"/> Doesn't supervise enough | <input type="checkbox"/> Around when needed |
| <input type="checkbox"/> Quick-tempered | <input type="checkbox"/> Lazy |

CO-WORKERS: Think of the majority of the *people that you work with* now. How well does each of the following words describe these people?

- | | |
|---|---|
| <input type="checkbox"/> Stimulating | <input type="checkbox"/> Talk too much |
| <input type="checkbox"/> Boring | <input type="checkbox"/> Smart |
| <input type="checkbox"/> Slow | <input type="checkbox"/> Lazy |
| <input type="checkbox"/> Ambitious | <input type="checkbox"/> Unpleasant |
| <input type="checkbox"/> Stupid | <input type="checkbox"/> No privacy |
| <input type="checkbox"/> Responsible | <input type="checkbox"/> Active |
| <input type="checkbox"/> Fast | <input type="checkbox"/> Narrow interests |
| <input type="checkbox"/> Intelligent | <input type="checkbox"/> Loyal |
| <input type="checkbox"/> Easy to make enemies | <input type="checkbox"/> Hard to meet |

WORK GROUP

SECTION 4: This section is concerned with your work group. For this survey, consider the members of your flight as your work group.

Please write a number beside each statement based on the following scale.

- | | | | | | | |
|----------------------|----------|----------------------|-----------|-------------------|-------|-------------------|
| 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| Strongly
Disagree | Disagree | Slightly
Disagree | Uncertain | Slightly
Agree | Agree | Strongly
Agree |
- ___ 1. My work group knows exactly what things it has to do.
 - ___ 2. Each member of my work group has a clear idea of the group goal.
 - ___ 3. We tell each other the way we are feeling.
 - ___ 4. My co-workers are afraid to express their real views.
 - ___ 5. In my work group, everyone's opinions get listened to.
 - ___ 6. If we have a decision to make, everyone is involved in making it.

SUPERVISOR

SECTION 5: This section is concerned with you immediate supervisor. This is the person who will write your performance report.

Please write a number beside each statement based on the following scale.

- | | | | | | | |
|----------------------|----------|----------------------|-----------|-------------------|-------|-------------------|
| 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| Strongly
Disagree | Disagree | Slightly
Disagree | Uncertain | Slightly
Agree | Agree | Strongly
Agree |
- ___ 1. My supervisor makes sure subordinates have clear goals to achieve.
 - ___ 2. My supervisor makes sure subordinates know what has to be done.
 - ___ 3. My supervisor makes it clear how I should do my job.
 - ___ 4. My supervisor helps me solve work-related problems.
 - ___ 5. My supervisor helps me discover problems before they get too bad.
 - ___ 6. My supervisor makes most decisions without asking subordinates their opinions.
 - ___ 7. My supervisor makes important decisions without involving subordinates.

ORGANIZATION

SECTION 6: This section is concerned with the overall organization. For this survey, consider the 55th Security Police Squadron as the organization.

Please write a number beside each statement based on the following scale.

1	2	3	4	5	6	7
Strongly Disagree	Disagree	Slightly Disagree	Uncertain	Slightly Agree	Agree	Strongly Agree

- ___ 1. Major decisions are very centralized.
- ___ 2. Formal policies and rules govern most activities in the organization.
- ___ 3. Long-term planning is neglected.
- ___ 4. People working in this organization share a common definition of its mission.
- ___ 5. Top administrators have high credibility.
- ___ 6. The organization tries new activities or policies, but not until others have found them successful
- ___ 7. The organization is likely to be first to try new activities or policies.

COMMITMENT

SECTION 7: This section is concerned with your commitment to remain employed by the United States Air Force in your current career field.

Please write a number beside each statement based on the following scale.

1	2	3	4	5	6	7
Very Inaccurate	Mostly Inaccurate	Slightly Inaccurate	Uncertain	Slightly Accurate	Mostly Accurate	Very Accurate

- ___ 1. I am very much personally involved in my work.
- ___ 2. I often think about getting out of the Air Force.
- ___ 3. I live, eat, and breathe my job.
- ___ 4. If I could get out of the Air Force, I would look for a new job within the year.
- ___ 5. The most important things which happen to me involve my job.
- ___ 6. I would like to have a different job, in or out of the Air Force.

VALUES

SECTION 8: This section pertains to your personal values. Arrange these 18 values in order of their importance to you as guiding principles in your life. Study the list carefully, then pick the value that is most important to you. Write a "1" in the box next to this value. Continue to rank each value until you list the least important value as "18." Change your rankings as often as you wish, but only use each number once.

	A COMFORTABLE LIFE (a prosperous life)
	AN EXCITING LIFE (a stimulating, active life)
	A SENSE OF ACCOMPLISHMENT (lasting contribution)
	A WORLD AT PEACE (free of war and conflict)
	A WORLD OF BEAUTY (beauty of nature and the arts)
	EQUALITY (brotherhood, equal opportunity for all)
	FAMILY SECURITY (taking care of loved ones)
	FREEDOM (independence, free choice)
	HAPPINESS (contentedness)
	INNER HARMONY (freedom from inner conflict)
	MATURE LOVE (sexual and spiritual intimacy)
	NATIONAL SECURITY (protection from attack)
	PLEASURE (an enjoyable, leisurely life)
	SALVATION (saved, eternal life)
	SELF-RESPECT (self-esteem)
	SOCIAL RECOGNITION (respect, admiration)
	TRUE FRIENDSHIP (close companionship)
	WISDOM (a mature understanding of life)